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AUDIT REPORT

OFFICE OF AUDITS

ACTIONS NEEDED TO ENSURE SCIENTIFIC AND
TECHNICAL INFORMATION IS ADEQUATELY REVIEWED
AT GODDARD SPACE FLIGHT CENTER, JOHNSON
SPACE CENTER, LANGLEY RESEARCH CENTER, AND
MARSHALL SPACE FLIGHT CENTER

OFFICE OF INSPECTOR GENERAL



National Aeronautics and
Space Administration

Final report released by:

signed

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Acronyms

CASI	Center for AeroSpace Information
CIO	Chief Information Officer
FY	Fiscal Year
GAO	Government Accountability Office
NPD	NASA Policy Directive
NPR	NASA Procedural Requirements
OIG	Office of Inspector General
STI	Scientific and Technical Information
STIPO	Scientific and Technical Information Program Office

OVERVIEW

ACTIONS NEEDED TO ENSURE SCIENTIFIC AND TECHNICAL INFORMATION IS ADEQUATELY REVIEWED AT GODDARD SPACE FLIGHT CENTER, JOHNSON SPACE CENTER, LANGLEY RESEARCH CENTER, AND MARSHALL SPACE FLIGHT CENTER

The Issue

This audit was initiated in response to a hotline complaint regarding the review, approval, and release of scientific and technical information (STI) at Johnson Space Center. The complainant alleged that Johnson personnel conducting export control reviews of STI were not fully qualified to conduct those reviews and that the reviews often did not occur until after the STI had been publicly released. NASA guidance requires that STI, defined as the results of basic and applied scientific, technical, and related engineering research and development, undergo certain reviews prior to being released outside of NASA or to audiences that include foreign nationals. The process includes technical, national security, export control, copyright, and “trade secret” (e.g., proprietary data) reviews. The review process was designed to preclude the inappropriate dissemination of sensitive information while ensuring that NASA complies with a requirement of the National Aeronautics and Space Act of 1958 (the Space Act)¹ to “provide for the widest practicable and appropriate dissemination” of information resulting from NASA research activities.

We focused our audit on evaluating the STI review process: specifically, determining whether the roles and responsibilities for the review, approval, and release of STI were adequately defined and documented in NASA and Center-level guidance and whether that guidance was effectively implemented at Goddard Space Flight Center, Johnson Space Center, Langley Research Center, and Marshall Space Flight Center. Johnson was included in the review because it was the source of the initial complaint, and Goddard, Langley, and Marshall were included because those Centers consistently produce significant amounts of STI.

On September 29, 2006, the Office of Inspector General (OIG) received a request from 14 U.S. Senators to investigate allegations that NASA was suppressing the release of scientific research and censoring its scientists. The OIG’s Office of Investigations initiated an administrative investigation to address the specific complaints cited in the

¹ The Space Act established NASA as the civilian agency with the responsibility of exercising control over aeronautical and space activities sponsored by the United States, except for those activities primarily associated with the development of weapons systems, military operations, or the defense of the United States.

request, which were the alleged suppression of individual scientists to express their views through public appearances or through NASA-sponsored press releases. The results of that administrative investigation were reported to Congress separately. This audit does not address the specific allegations cited in the congressional request of individual scientists who claimed their research was suppressed. Instead, because the release of scientific research is contingent upon NASA's STI review process, we expanded the scope of our audit to determine whether the STI review process was used as a means to suppress the release of scientific research at Goddard, Johnson, Langley, and Marshall. Details of the audit's scope and methodology are in Appendix A.

Results

The roles and responsibilities for the review, approval, and release of NASA STI were adequately defined and documented in NASA guidance; however, that guidance had not been effectively implemented at Goddard, Johnson, Langley, and Marshall. NASA Procedural Requirements (NPR) 2200.2B, "Requirements for Documentation, Approval, and Dissemination of NASA Scientific and Technical Information," March 25, 2005, states that only STI that has been reviewed for technical accuracy and conformance with applicable law, policy, and publication standards may be publicly released. Out of the 4,702 STI items included in our review at Goddard, Johnson, Langley, and Marshall, we identified 413 STI items² that had been publicly released during fiscal year (FY) 2005 and FY 2006 without the required reviews. Of those 413 items, 363 were released prior to completion of the review process, 19 were released after rejection by one or more of the reviewing authorities,³ and 31 were never submitted for review.

Although none of the 413 STI items that we identified were of a restricted nature (for example, export-controlled or classified), each time STI is released without the required review, the risk of releasing restricted or otherwise sensitive information is increased. The STI authors at Goddard, Johnson, Langley, and Marshall provided various reasons as to why they released STI without the required reviews. The most common reason provided was that because the Agency did not notify the authors whether the STI had been approved or rejected for release, the authors released STI assuming that the review was complete and the approval had been granted. Other authors stated that they were unaware of, had forgotten about, or had never been trained on the NPR requirement.

² The actual number of STI items released without the required reviews could be much higher than 413. Our sampling methodology, which is discussed in detail in Appendix A, did not allow us to project our results from Johnson or Langley. In addition, we identified the 31 STI never submitted for review by searching NASA conference Web sites for STI that was presented at the conference. Our search for unreviewed STI did not include Web sites for conferences that NASA scientists may have attended but which were not NASA or NASA-sponsored conferences. We also did not search scientific journals or other media for unreviewed STI. Had we done so, we may have identified additional unreviewed STI.

³ Although releasing STI after it was "rejected for release" implies that restricted or sensitive STI may have been inappropriately released, the 19 STI were generally rejected for minor clerical or technical errors that did not impact the overall content or message of the STI. We did not identify any STI that was rejected for release because the STI was of a sensitive nature.

Although we could not specifically validate the authors' level of awareness, none of the four Centers had active programs designed to educate new employees or to periodically brief existing employees about the STI review requirement.

The effectiveness of NASA's STI review process could be improved if STI authors are timely notified of the results of the STI review and if NASA took steps to ensure STI authors are aware of their responsibilities under NPR 2200.2B. Those actions would remove uncertainty from the process and further reduce NASA's risk of inappropriately releasing restricted or sensitive STI.

The risk of inappropriately releasing restricted or sensitive STI could be further reduced if the STI Program Office monitored the effectiveness of the STI review process. NASA Policy Directive (NPD) 2200.1, "Management of NASA Scientific and Technical Information (STI)," March 28, 2003, requires that the Program Office monitor certain elements of the STI Program, such as the quantity of STI received by NASA and the use of that STI by NASA and non-NASA personnel. However, the guidance does not require that the effectiveness of the STI review process be monitored. Such monitoring would enable the Agency to take immediate corrective action if any problem areas are identified.

The ability of the STI Program Office to monitor the effectiveness of the STI review process could be improved if the process was automated Agency-wide. Two of the four Centers we visited (Johnson and Langley) used automated systems to track STI throughout the review process, while the other two Centers (Goddard and Marshall) used a paper-based process. The automated systems provided STI managers with more comprehensive and timely data when compared with the paper-based systems. Implementation of an Agency-wide automated system would improve the STI Program Office's ability to monitor the effectiveness of the STI review process by providing more complete and accurate data.

We found no evidence while conducting our audit that the STI review process was used as a means to suppress scientific research at Goddard, Johnson, Langley, and Marshall. Because the STI reviewing authorities could use the review process to suppress the results of scientific research by rejecting certain STI for public release, we surveyed 287 NASA STI authors concerning rejected STI. We also conducted further analysis of the 19 STI that we identified as having been rejected in FY 2005 and FY 2006 to consider whether STI on a specific subject matter or by an individual author had been disproportionately rejected.

We asked the 287 STI authors whether they had ever had an STI item rejected for public release and, if so, whether they agreed with the reason for rejection. We received responses from 264 authors (a 92 percent response rate), of whom 96 reported that their STI had been rejected for release. All 96 authors told us the STI was rejected because of errors on the submission form or the need to make minor technical revisions to the STI. Although 13 of the authors disagreed with the reason for rejection, those disagreements

were based on the STI review process itself (for example, the process took too long, the submission form was difficult to understand) or writing style differences between an author and the reviewing authorities. None of the authors reported that they believed the reviewing authority had rejected the STI in an attempt to suppress the results of their research.⁴ In addition, our analysis of the 19 STI items rejected in FY 2005 and FY 2006 at Goddard, Johnson, Langley, and Marshall did not identify any disproportionate rejections by subject matter or author.

Management Action

To improve the effectiveness of NASA's STI review process and thereby reduce the risk of releasing restricted or sensitive STI, our March 6, 2008, draft of this report contained a recommendation that the Center Directors at Goddard, Johnson, Langley, and Marshall develop and implement a plan to increase employee awareness of the STI review process. We also recommended that the NASA Chief Information Officer (CIO) revise the relevant NPR and NPD to require that Center STI Managers timely notify authors when STI is approved or rejected for release, require that authors not release STI until they receive that notification, and establish an additional performance measure for monitoring the effectiveness of the STI review process.

In a consolidated response to the draft of this report (see Appendix C), management concurred with our recommendations and described actions to be taken by the Centers to increase awareness of STI review requirements. Goddard planned an outreach initiative in April 2008 and Johnson plans to distribute articles on STI review requirements with a Web site link to an educational presentation on STI review requirements. Langley plans to provide new employees with presentations on STI requirements, and Marshall plans to insert quarterly notices in the Center newsletter.

In response to our recommendations to revise the NPR and NPD, the CIO stated that NASA would issue an interim directive by October 7, 2008, that will require timely notification of authors, reinforce the requirement to review STI before its release, and institute a performance measure for monitoring the effectiveness of the STI review process. The interim directive will remain in effect until NPR 2200.2B and NPD 2200.1 are revised.

We consider management's proposed actions to be responsive and no additional comments on these recommendations are necessary. The recommendations are resolved and will be closed after we verify that all actions have been completed.

⁴ A review published by the Government Accountability Office (GAO), "Federal Research: Policies Guiding the Dissemination of Scientific Research from Selected Agencies Should Be Clarified and Better Communicated" (GAO-07-653, May 2007), reported that NASA dissemination policies could be better communicated. GAO estimated that 91 percent of NASA researchers believe that the Agency supports dissemination of research results through publications.

Although this report concludes that an automated STI tracking system would better facilitate data collection for monitoring the effectiveness of the STI review process, we did not make a recommendation concerning an automated system in the draft report because the STI Program Office had requested “overguidelines” funding⁵ in FY 2009 for the deployment, maintenance, and implementation of an Agency-wide automated STI tracking system. However, while we were preparing the final report, the STI Program Office informed us that the CIO had denied that funding request. We believe that deployment of an automated STI tracking system is critical to ensuring that the STI Program Office and the Center STI Managers have the data needed to effectively monitor the STI review process and decrease the number of NASA STI items released without proper review. Therefore, we have added a recommendation to this report (Recommendation 4) that the CIO determine how best to attain the intended benefits of an Agency-wide automated STI tracking system and provide an appropriate plan of action. We request that the CIO provide comments on the added recommendation by July 1, 2008.

⁵ According to NASA management, overguidelines funding refers to funds that are above existing program financial guidelines.

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INTRODUCTION

In January 2006, the Office of Inspector General (OIG) received a hotline complaint regarding the review, approval, and release of scientific and technical information (STI) at Johnson Space Center. The complainant alleged that Johnson personnel responsible for conducting export control reviews of STI were not fully qualified to conduct those reviews and that the reviews often did not occur until after the STI had been publicly released or otherwise disseminated. NASA guidance requires that STI undergo a series of reviews before it can be published or otherwise disseminated outside of NASA. One of the reviews required is an export control review.

During an initial inquiry into the complaint, we determined that Johnson personnel were adequately trained to conduct export control reviews; however, we identified potential problems within the STI review process. Based on the results of our initial inquiry, we initiated this audit of the STI review process in September 2006. In addition to reviewing the STI review process at Johnson, we reviewed the process at Goddard Space Flight Center, Langley Research Center, and Marshall Space Flight Center, because those Centers consistently produce significant amounts of STI.

On September 29, 2006, the OIG received a request from 14 U.S. Senators to investigate allegations that NASA was suppressing the release of scientific research and censoring its scientists. The OIG's Office of Investigations initiated an administrative investigation to address the specific allegations cited in the request, the results of which were separately reported to Congress. Because the release of scientific research is contingent upon successful completion of the STI review process, we expanded the scope of our audit to evaluate whether the process was used as a means to suppress the release of scientific research at Goddard, Johnson, Langley, and Marshall.

Background

STI. NASA defines STI as the results (facts, analyses, and conclusions) of basic and applied scientific, technical, and related engineering research and development. STI also includes relevant management, industry, and economic information. Examples of STI produced by NASA include research reports, journal articles, conference proceedings, presentations, technical videos, laboratory notes, and scientific and technical operational information. NASA researchers, contractors, and grantees use STI to keep abreast of national and international advances in science and engineering, to reduce unnecessary duplication of effort, and to promote the productivity and cost-effectiveness of NASA research activities.

STI Program. NASA’s STI Program provides for public and internal distribution of information produced by and for NASA, fulfilling the requirement of the National Aeronautics and Space Act of 1958 (the Space Act)⁶ to “provide for the widest practicable and appropriate dissemination” of information resulting from NASA research activities. To meet that requirement, NASA collects, manages, publishes, and provides for long-term retention of STI. NASA provides access to the STI through a database containing approximately 4 million citations and an increasing number of full-text digital NASA documents. The database, accessible at <http://www.sti.nasa.gov>, is operated for NASA by the Center for AeroSpace Information (CASI), a contractor that acquires, organizes, disseminates, and archives the STI.

The STI Program is responsible for ensuring that NASA protects STI that may contain information for which publication or distribution is restricted by law, regulation, or policy. This includes STI containing information that is restricted because it is export-controlled, classified, proprietary, copyrighted, or patented, as well as information protected by the Privacy Act. To preclude the distribution of restricted or sensitive STI, authors must submit STI through a review process, which includes reviews for technical accuracy, export-controlled information, classified information, copyright violations, and proprietary data (i.e., “trade secrets”).

STI Program Management. NASA’s Chief Information Officer (CIO) is responsible for planning and managing the implementation of NASA’s STI Program and assessing its effectiveness. The CIO has delegated responsibility for STI policy and program operations to the Scientific and Technical Information Program Office (STIPO). STIPO, which organizationally reports to the CIO, is located at Langley and has a staff of five personnel. STIPO’s specific responsibilities include

- developing and implementing policies and procedures for NASA’s STI Program;
- operating and managing NASA’s STI Program in accordance with Federal laws and regulations and NASA’s policies and procedures;
- streamlining Agency and Center processes, procedures, and systems for identifying, acquiring, tracking, and disseminating STI; and
- overseeing the CASI database.

Although the CIO is responsible for the overall STI Program, the Center Directors, who are organizationally outside of the CIO’s chain of command, are responsible for ensuring that Center personnel comply with STI Program guidance. The Center Directors designate a Center STI Manager, who is responsible for the STI review process and for

⁶ The Space Act established NASA as the civilian agency with the responsibility of exercising control over aeronautical and space activities sponsored by the United States, except for those activities primarily associated with the development of weapons systems, military operations, or the defense of the United States.

maintaining records of all Center-produced STI that is released or published external to NASA. At the operational level, NASA managers, contracting officers, contracting officer's technical representatives, and authors are responsible for coordinating with Center STI Managers to ensure that STI is properly reviewed and approved prior to its release.

STI Guidance. The primary guidance for NASA's STI Program is NASA Policy Directive (NPD) 2200.1, "Management of NASA Scientific and Technical Information (STI)," March 28, 2003, and NASA Procedural Requirements (NPR) 2200.2B, "Requirements for Documentation, Approval, and Dissemination of NASA Scientific and Technical Information," March 25, 2005. The NASA Centers may issue supplementary guidance or implementing instructions based on those documents.

Objectives

Our overall audit objective was to evaluate NASA's policies and procedures for the review, approval, and release of STI. Specifically, we determined whether the roles and responsibilities for the review, approval, and release of STI were adequately defined and documented in NASA guidance and whether NASA had effectively implemented that guidance at Goddard, Johnson, Langley, and Marshall. We also determined whether the STI review process was used as a means to suppress the release of scientific research at those four Centers. See Appendix A for details of the audit's scope and methodology, our review of internal controls, and prior coverage.

STI RELEASED WITHOUT REQUIRED REVIEW

The roles and responsibilities for the review, approval, and release of NASA STI were adequately defined and documented in NASA guidance; however, that guidance had not been effectively implemented at Goddard, Johnson, Langley, and Marshall. NPR 2200.2B states that only STI that has been reviewed for technical accuracy and conformance with applicable law, policy, and publication standards may be publicly released. Out of the 4,702 STI items included in our review at Goddard, Johnson, Langley, and Marshall, we determined that STI authors had publicly released 413 STI items⁷ during fiscal year (FY) 2005 and FY 2006 without obtaining the required reviews. Of those 413 items, 363 were released prior to completion of the review process, 19 were released after rejection by one or more of the reviewing authorities,⁸ and 31 were never submitted for review. The STI was released without the required reviews because

- Center STI Managers were not required to notify the STI authors as to whether the STI was approved or rejected for release,
- the review requirement was not adequately communicated to Center personnel, and
- STIPO did not monitor the effectiveness of the STI review process.

Although our audit did not identify any restricted STI that was inappropriately released, each time STI is released without the required review, the risk of releasing restricted or otherwise sensitive information is increased. More significantly, noncompliance could result in the release of restricted STI to prohibited sources, including countries or persons, which could negatively impact national security.

⁷ The actual number of STI items released without the required reviews could be much higher than 413. Our sampling methodology, which is discussed in detail in Appendix A, did not allow us to project our results from Johnson or Langley. In addition, we identified the 31 STI never submitted for review by searching NASA conference Web sites for STI that was presented at the conference. Our search for unreviewed STI did not include Web sites for conferences that NASA scientists may have attended but which were not NASA or NASA-sponsored conferences. We also did not search scientific journals or other media for unreviewed STI. Had we done so, we may have identified additional unreviewed STI.

⁸ Although releasing STI after it was “rejected for release” implies that restricted or sensitive STI may have been inappropriately released, the 19 STI were generally rejected for minor clerical or technical errors that did not impact the overall content or message of the STI. We did not identify any STI that was rejected for release because the STI was of a sensitive nature.

Roles and Responsibilities Adequately Defined

The roles and responsibilities for the review, approval, and release of NASA STI were adequately defined and documented in NPD 2200.1 and NPR 2200.2B. NPD 2200.1 requires NASA to publish, or otherwise release external to NASA, only STI that has been reviewed at the appropriate organizational level for technical accuracy and conformance with applicable law, policy, and publication standards. The NPD assigns the Center Directors the responsibility that STI review and approval is undertaken as appropriate, based on the nature of the STI. NPR 2200.2B contains a description of the STI review types:

- Technical review – performed by peers of the author who have expertise in the technical discipline of the research. The review is primarily for technical accuracy, quality, and data integrity.
- National security review – performed by the original classification authority⁹ to determine whether the information is subject to security classification.
- Export control review – performed by the Center Export Control Administrators or their designees to ensure that export-controlled information is not exported or disclosed to foreign nationals without proper authority.¹⁰
- Copyright review – performed by the Headquarters and Center patent or intellectual property counsel to ensure that information is not used or reproduced without protecting the exclusive rights reserved by a copyright owner.¹¹
- Proprietary and confidential commercial information review – performed by Headquarters and Center patent or intellectual property counsel to ensure that the proprietary data is properly identified and marked to indicate restricted dissemination.

The STI Managers are responsible for ensuring that personnel at their Centers are aware of the requirements contained in NPD 2200.1 and NPR 2200.2B. STI Managers are also responsible for coordinating with program or project managers who approve STI at the Centers, and authors of STI, to ensure that STI is reviewed before being published, disseminated, or otherwise released external to NASA.

⁹ The original classification authority is the individual authorized in writing, either by the President or by agency heads or other senior Government officials designated by the President, to classify information in the first instance.

¹⁰ Department of Commerce's Export Administration Regulations, 15 Code of Federal Regulations, parts 730-774, and the Department of State's International Traffic in Arms Regulations, 22 Code of Federal Regulations, parts 120-130, contain the restrictions on the release of export-controlled technology.

¹¹ Title 17, United States Code, Chapters 1-13, contain the copyright law that protects the exclusive rights reserved by a copyright owner.

The STI authors are responsible for initiating the STI review process by completing NASA Form 1676, “NASA Scientific and Technical Information (STI) Document Availability Authorization (DAA),” or a Center version of that form (see Appendix B for a copy of NASA Form 1676). Once all required reviews are completed and the STI is approved for full or restricted release, it may be published or presented at a meeting, conference, or other forum and is forwarded to CASI to be added to the CASI database. If the STI is rejected for release, the author can revise the STI and resubmit it.

Guidance Not Adequately Implemented

Although NASA’s guidance clearly states that a review is required before STI may be publicly released, that guidance was not adequately implemented at Goddard, Johnson, Langley, and Marshall. Out of the 4,702 STI items included in our review at those four Centers, we determined that STI authors had publicly released 413 STI items during FY 2005 and FY 2006 without obtaining the required reviews (Goddard, 123; Johnson, 87; Langley, 70; and Marshall, 133). Of the 413 items, 363 were released prior to completion of the review process, 19 were released after rejection by one or more of the reviewing authorities, and 31 were never submitted for review.

All four Centers had established an STI review process, and we reviewed each of those processes. We were able to review more robust sets of information at Johnson and Langley because those Centers had automated their review process. Although NPR 2200.2B requires Centers to establish an STI review process, it does not require an automated tracking system. The automated systems contained the date the author submitted the STI for review, the completion date for each review, whether the reviewer approved or rejected the STI for release, and the STI release date. Therefore, the STI Manager had visibility over each step in the review process. In contrast, the use of paper-based systems at Goddard and Marshall limited their (and our) visibility over the ongoing STI reviews because the STI Managers had no record of when a review was initiated or how many STI reviews were in process at any one time. In addition, since the Goddard and Marshall STI Managers were only provided copies of STI that had been fully approved, they had no knowledge of STI that was rejected at some point in the review process, nor could they effectively track or trend any historical data.

Because neither the automated or paper-based systems would have a record of STI that had never been submitted for review, we performed a limited Internet search of NASA and NASA-sponsored conferences looking for publicly available conference presentations that might include unreviewed STI. Our search for unreviewed STI did not include Web sites for conferences that NASA scientists may have attended but which were not NASA or NASA-sponsored conferences. We also did not search scientific journals or other media for unreviewed STI. Had we done so, we may have identified additional STI that had been released without the required review.

Centers with an Automated System. The automated systems used at Johnson and Langley allowed us to perform a more robust STI review because we could easily identify the review and release dates for all STI processed in FY 2005 and FY 2006. We were also able to identify STI that had been rejected for release at some point during the review process.

Johnson. We identified 87 STI items that were released by Johnson personnel during FY 2005 and FY 2006 without obtaining the required reviews. Of those 87 items, 64 were released prior to completion of the review process, 11 were released after rejection by one or more of the reviewing authorities, and 12 were never submitted for review.

Our initial review of all records contained in Johnson's automated system indicated that 478 of the 1,369 STI items released in FY 2005 and FY 2006 were either released prior to approval or after rejection. Because the STI authors or reviewers could have posted incorrect dates in the automated system, we performed an in-depth review to validate the dates for a discovery sample¹² of 160 of the 478 STI items. That in-depth review consisted of verifying the release date by obtaining a copy of the STI or contacting the STI author. Of those 160 STI items, we found that 55 had never been released or had incorrect dates in the automated system and, therefore, had not been inappropriately released. The release dates for another 30 items could not be verified because neither the STI nor the author could be located. We validated that Johnson personnel released the remaining 75 items without the required reviews. Of those 75 items, 64 were released before the review process had been completed and 11 were released after being rejected. Those 75 STI and the 12 STI that we found on conference Web sites are the 87 items that we identified at Johnson as having been released without the required reviews.

Langley. We identified 70 STI items that were released by Langley personnel during FY 2005 and FY 2006 without obtaining the required reviews. Of those 70 items, 57 were released prior to completion of the review process, 8 were released after rejection by one or more of the reviewing authorities, and 5 were never submitted for review.

Our initial review of all records contained in Langley's automated system indicated that 441 of the 3,260 STI items released in FY 2005 and FY 2006 were either released prior to approval or after rejection. We then performed an in-depth review to validate the dates for a discovery sample of 153 of those 441 STI items. Of those 153 STI items, 7 had incorrect dates in the automated system and the release dates for 81 could not be verified: 12 because neither the STI nor the author could be located;

¹²Discovery sampling methodology produces a minimal sample size and can be used to accept a population if the sample is error free. The use of discovery sampling allowed us to reduce the number of STI required for in-depth review at Johnson and Langley. If we had not identified errors within the discovery sample, we could have projected our results. Details concerning our sampling methodology are discussed in Appendix A.

68 because the STI was recalled by the author; and 1 because it was entered into the system as a test. We validated that Langley personnel released the remaining 65 items without the required reviews. Of those 65 items, 57 were released before the required review process had been completed and 8 were released after being rejected. Those 65 STI items and the 5 that we found on conference Web sites are the 70 items that we identified at Langley as having been released without the required reviews.

Centers with a Paper-Based System. The paper-based systems used at Goddard and Marshall limited our ability to evaluate all STI processed in FY 2005 and FY 2006. The Center STI Managers only maintained copies of STI and the Document Availability Authorization (NASA Form 1676) for approved STI items; consequently, we could not identify STI that had been rejected for release. We also could not identify STI that was still in the process of being reviewed but may have been released already. Because we did not have visibility over all STI submitted for review in FY 2005 and FY 2006, we used random sampling to select STI items for reviews.

Goddard. We determined that Goddard personnel released 123 STI items without obtaining the required reviews during FY 2005 and FY 2006. The 123 STI comprise 114 projected STI items and 9 that we found through our Internet search. Our projection of 114 STI items was obtained by applying 5.2 percent to the 2,196 STI items maintained in the STI Manager's file for FY 2005 and FY 2006. Using a random sample of 290 STI items, we validated that 15 (5.2 percent) had been released prior to completing the review process. The 114 projected STI items and the 9 that we found on conference Web sites are the 123 items that we identified at Goddard as having been released without the required reviews.

Marshall. We determined that Marshall personnel released 133 STI items without obtaining the required reviews during FY 2005 and FY 2006. The 133 STI comprise 128 projected STI items and 5 that we found through our Internet search. Our projection of 128 STI items was obtained by applying 8.2 percent to the 1,556 STI items maintained in the STI Manager's file for FY 2005 and FY 2006. Using a random sample of 280 STI items, we validated that 23 (8.2 percent) had been released prior to completing the review process. The 128 projected STI items and the 5 that we found on conference Web sites are the 133 items that we identified at Marshall as having been released without the required reviews.

STI Authors Not Notified of Review Process Completion

The STI review process, as defined in NPR 2200.2B, does not require the Center STI Managers to notify authors that their STI was approved or rejected for release. We followed up with the STI authors who either had issued their STI before the review process was complete or had released STI after it had been rejected for release. The most common reason provided by those STI authors for releasing the STI was that they had assumed the STI was approved for release because they were never notified otherwise.

Processes such as STI reviews should be “closed loop” processes. A closed loop process is one in which the process ends at the same point that it begins. Applied to an STI review, a closed loop process would require notification to the STI author that the STI was either approved or rejected for release. This would help prevent authors from releasing STI before it was adequately reviewed. Implementing a closed loop process can be accomplished by revising NPR 2200.2B to require Center STI Managers to develop and implement a process to notify STI authors as to whether their STI was approved or rejected for release. The NPR should also be revised to prohibit STI authors from releasing STI until notified of approval. Those revisions would remove uncertainty from the process and provide both STI Managers and authors a record of the STI’s approval or rejection.

STI Review Requirement Not Adequately Communicated

Although NPR 2200.2B clearly states that the STI authors are responsible for ensuring that STI is adequately reviewed prior to being released, not all STI authors were aware of the requirement. We followed up with the authors who had publicly released STI without submitting it for review. Those authors told us that they were unaware of, had forgotten about, or had never been trained on the review requirement. While we could not specifically validate the authors’ level of awareness of the STI review requirement, none of the four Centers included in our audit had active programs designed to educate new employees or periodically brief existing employees about the STI review requirement. The lack of training is consistent with our finding in “NASA Should Improve Employee Awareness of Requirements for Identifying and Handling Sensitive But Unclassified Information” (IG-06-010-Redacted, May 9, 2006). We found that NASA personnel had not been adequately trained to identify and handle Sensitive But Unclassified information. Sensitive But Unclassified STI should be identified as such during the STI review process to ensure that it is not inadvertently disseminated.

NPR 2200.2B states that the Center Directors are responsible for ensuring that Center personnel comply with the NPR and that the Center STI Managers are responsible for ensuring that Center personnel are aware of the STI policies and procedures. However, STI Managers at Goddard, Johnson, Langley, and Marshall generally relied on export control personnel to inform Center personnel about the STI review process during new employee orientation or other periodic export control briefings. To improve compliance with the STI review process, the Center STI Managers need to ensure that employees are aware of and fully understand the process and their associated roles and responsibilities. The Center Directors at Goddard, Johnson, Langley, and Marshall should work in conjunction with the STI Managers to develop and implement an awareness plan concerning the STI review process. That plan could include periodic Center-wide e-mails and required annual training that inform and educate STI authors on the requirements contained in NPR 2200.2B.

Effectiveness of STI Review Process Not Monitored

Although STIPO monitored certain elements of the STI Program, its efforts were focused primarily on productivity and not the effectiveness of the STI review process. NPD 2200.1 requires that the effectiveness of the STI collection and dissemination process be monitored by use of the following metrics:

- Capture NASA STI – NASA will increase the quantity of NASA STI and non-NASA STI captured for the CASI database.
- Access and disseminate STI – NASA will track the number of primary and secondary distributions or access of STI, including electronic searches (e.g., Internet searches), to determine the usage of its products and services.
- Acquire external STI – NASA will compare the subject matter requirements of users against STI access to global sources (other agencies, domestic and international sources) in order to provide relevant information for NASA’s missions and programs.
- Measure customer satisfaction – NASA will routinely analyze user comments regarding the timeliness of service and usefulness of information.

STIPO collects this data and reports it annually to the Agency. However, NPD 2200.1 does not require STIPO to have metrics or other monitoring activities designed to measure the effectiveness of the STI review process. Because the review process is the primary method NASA has for ensuring that only approved STI is released, it is imperative that its effectiveness be monitored and that corrective action be taken in response to any problems identified. In conducting such monitoring activities, STIPO should work with the Center Directors and Center STI Managers to collect data concerning the review, approval, and release of STI. STIPO and the Centers should then be able to identify those authors who are not complying with NPR 2200.2B.

Agency-wide Automation Should Facilitate Monitoring

The Centers with automated systems have access to more comprehensive and timely data with which to monitor the effectiveness of the STI review process. An automated system can be periodically queried to identify inappropriately released STI, while a paper-based system cannot. STI Managers using paper-based systems must review each individual NASA Form 1676 to identify inappropriately released STI, which, depending on the number reviewed, could be a time-consuming task. In addition, those STI Managers do not have a comprehensive data set because they are only provided copies of fully approved STI; they have no knowledge of STI that is still being reviewed or STI that was rejected at some point during the review.

NASA's CIO and STIPO began to address the automation issue and, in February 2007, commissioned a study of the automated STI review systems at Ames Research Center, Johnson, Langley, Stennis Space Center, and the Environmental Protection Agency. The study, which was issued June 28, 2007, recommended that NASA partially centralize the STI review and approval process to provide for maximum benefit at minimum cost. The study also recommended that NASA use the Ames automated system as a baseline and incorporate the user functionality of Langley's system. Based on the results of the study, STIPO requested funding for a centralized STI automated system, the justification of which is a reduction in long-term program costs. STIPO has since adapted the Ames system for Agency-wide use, but STIPO's baseline funding for FY 2009 will not allow for system rollout, maintenance, and implementation. As a result, STIPO initiated a request for overguidelines funding¹³ for FY 2009 and beyond for the automation.

The actions taken by STIPO to pursue an automated system will provide management with more complete and accurate data, which should improve the Agency's ability to monitor the effectiveness of the STI review process. Improved monitoring should also decrease the number of NASA STI items released without proper review. In the draft of this report, we did not make a recommendation concerning an automated system because STIPO had requested the overguidelines funding. While we were preparing the final report, STIPO informed us that the CIO had denied that funding request. Therefore, we have added a recommendation in this final report (Recommendation 4) that the CIO determine how to best attain the intended benefits of an Agency-wide automated STI tracking system and provide an appropriate plan of action.

Increased Risk of Releasing Restricted or Sensitive STI

Although we did not identify any restricted STI that was inappropriately released, we believe this area presents significant risk for NASA because authors can easily release STI without complying with the required review process. Each time NASA releases STI before it is appropriately reviewed, the risk of violating export control laws, national security regulations, or copyright restrictions increases. In addition, NASA does not have reasonable assurance that it is fully compliant with the laws and regulations governing the release of restricted information or with the Space Act. More significantly, noncompliance could result in the release of restricted STI to prohibited sources, including countries or persons, which could negatively impact national security.

NASA strives for the widest practicable and appropriate dissemination of information concerning its activities and pursues ever-greater levels of partnership and cooperation in national and international space activities. However, "appropriate" dissemination encompasses the need for NASA to protect U.S. interests by reducing risk and restricting access to sensitive material, such as export-controlled technical data and industry

¹³According to NASA management, overguidelines funding refers to funds that are above existing program financial guidelines.

proprietary information. Compliance with the STI review process helps NASA achieve its mission while maintaining national security and limiting access to sensitive space technologies.

No Evidence to Support Suppression of Scientific Research within the STI Review Process

We found no evidence that the STI review process at Goddard, Johnson, Langley, or Marshall was used as a means to suppress the results of scientific research, and therefore, the report contains no recommendations concerning this issue. Because the STI reviewing authorities could use the review process to suppress the results of scientific research by rejecting certain STI for public release, we surveyed 287 NASA STI authors concerning rejected STI. We also conducted further analysis of the 19 STI that we identified as having been rejected in FY 2005 and FY 2006 to consider whether STI on a specific topic or by an individual author had been disproportionately rejected.

STI Author Survey. Our survey results did not indicate that the reviewing authorities were using the STI review process as a means to suppress the release of NASA's scientific research. We elected to survey those authors who, based on our initial review of STI, appeared to have released STI prior to approval or after rejection, since we were already following up with those authors concerning those specific reviews. Of the 287 authors surveyed, 264 responded to our questions (92 percent response rate).

We asked the authors whether they had ever had an STI item rejected for public release. Of the 264 authors who responded, 96 responded "yes," and 168 responded "no."¹⁴ We followed up with the 96 authors who responded yes to determine the reason for rejection and whether the author agreed with the reason given by the reviewing authority. All 96 authors told us the STI was rejected because of errors on the submission form or the need to make minor technical revisions to the STI. Of the 96 authors, only 13 disagreed with the reason for rejection; however, the disagreements were based on the STI process itself (for example, the process took too long, the submission form was difficult to understand) or writing style differences between an author and the reviewing authority. None of the authors reported that they believed the reviewing authority had rejected the STI in an attempt to suppress the results of their research.¹⁵ Therefore, based on our survey results, we could not support that a relationship existed between rejected STI and suppression of scientific research.

¹⁴The 96 includes 18 authors who were unaware that their STI had been rejected for release until we notified them of the rejection.

¹⁵A review published by the Government Accountability Office (GAO), "Federal Research: Policies Guiding the Dissemination of Scientific Research from Selected Agencies Should Be Clarified and Better Communicated" (GAO-07-653, May 2007), reported that NASA dissemination policies could be better communicated. GAO estimated that 91 percent of NASA researchers believe that the Agency supports dissemination of research results through publications.

Analysis of Rejected STI. Our analysis of the 19 STI items that we identified as rejected during FY 2005 and FY 2006 did not indicate that STI on a specific topic or by an individual author was disproportionately rejected. The titles of the STI varied greatly, including “Space Medicine,” “Wireless Communication and Interfaces Aboard the Spacecraft,” “A New Method for Acquiring Measurements,” and “Recertification of Liquid Oxygen (LOX) Run Tank.” We were unable to identify any trends that indicated a single topic or specific author’s work was routinely rejected for release.

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

Recommendation 1. The Center Directors at Goddard, Johnson, Langley, and Marshall, in coordination with the Center STI Managers, should establish and implement a plan to increase awareness of the STI review requirements contained in NPR 2200.2B.

Management’s Response. The Center Directors at Goddard, Johnson, Langley, and Marshall concurred with the recommendation, as described in the comments provided by the CIO (see Appendix C).

Goddard will issue Center STI policy by October 7, 2008. The Goddard STI Program Office conducted outreach initiatives to promote awareness in May and August 2007 and planned a third initiative for April 2008. In addition, the Center STI Program Office is publishing a brochure for Center-wide distribution that will serve as an STI reference tool, focusing on key aspects of the STI Program. Additionally, in February 2008, the Center STI Program Office implemented a process to notify authors in writing if requests for authorization to distribute STI are incomplete or improperly prepared.

Johnson disagreed with the number of STI items that we stated were released by Johnson authors prior to review or approval, but stated that Johnson continues to improve its automated tracking system and Center-wide awareness of STI review requirements. Johnson distributed articles on STI requirements, dated January 3 and 11, 2008, via a Center-wide e-mail and is implementing a plan to increase awareness that should be in place by October 7, 2008. Johnson expects to distribute regular articles on STI requirements, with a Web site link to an educational presentation on STI requirements; give an educational presentation quarterly; add STI education to new employee orientation; and meet directly with those organizations with the largest percentage of total STI items released.

Langley has developed and will be implementing an STI awareness plan by October 7, 2008. The plan includes the Langley Center Director issuing a Center-wide e-mail regarding STI requirements and the Langley STI Manager providing presentations to new employees.

Marshall stated that it implemented an STI awareness plan in March 2008. Additional steps to increase awareness include a memorandum to all employees clarifying STI requirements, quarterly notices via “Inside Marshall” or Center-wide television, and required training.

Evaluation of Management’s Response. We consider management’s proposed actions to be responsive. The recommendation is resolved, and we will close the recommendation after we verify that all actions have been completed.

We did not revise the report based on Johnson’s disagreement with the number of STI items released prior to review or approval. The specific disagreement concerns the 11 Johnson STI that were released after rejection. We had initially identified 12 such STI, but based on documentation provided by the Johnson STI Manager, we revised the number to 9 STI. We subsequently identified two additional STI items that were released after rejection, which accounts for the 11 STI cited in this report. We provided the Johnson STI Manager with detailed information on those STI items, but did not receive any response; therefore, we did not revise the report.

Recommendation 2. The CIO should revise NPR 2200.2B to require that Center STI Managers timely notify STI authors as to whether their STI was approved or rejected for release and to prohibit STI authors from publicly releasing STI before approval notification is received.

Recommendation 3. The CIO should revise NPD 2200.1 to include “effectiveness of the STI review process” as one of the annual performance measures used to determine whether NASA is achieving compliance with the policy directive.

Management’s Response to Recommendations 2 and 3. The CIO concurred with both recommendations, stating that the STI Program will issue a NASA Interim Directive by October 7, 2008, requiring timely notification of authors and instituting an annual performance measure to determine the effectiveness of the STI review process. In addition, both NPR 2200.2B and NPD 2200.1 will be updated in the next full regular revision to include these requirements.

Evaluation of Management’s Response. We consider management’s proposed actions to be responsive. The recommendations are resolved and will be closed after we verify that all actions have been completed.

Recommendation 4. The CIO should determine how to best attain the intended benefits of an Agency-wide automated STI tracking system and provide an appropriate plan of action to do so.

Scope and Methodology

We performed this audit from September 2006 through April 2008 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.

We collected, reviewed, and analyzed NASA guidance pertaining to STI, to include NPD 2200.1, NPR 2200.2B, and Center supplements to that guidance. Three of the four Centers we visited had supplemental guidance: Johnson, Langley, and Marshall. Goddard follows the NPR.

We met with personnel from STIPO to obtain an overview of the program, to gain an in-depth understanding of the STI review process, and to obtain an understanding of the CASI database. We met with the STI Managers at Goddard, Johnson, Langley, and Marshall to obtain an understanding of local STI policies and procedures. We also met with Directorate managers at those Centers to obtain an understanding of the procedures for rejecting the release of STI.

We evaluated the STI review process at Goddard, Johnson, Langley, and Marshall. We evaluated Johnson's process because the initial hotline complaint originated from Johnson personnel that were responsible for conducting the STI export control reviews. We evaluated the processes at Goddard, Langley, and Marshall because STIPO records indicated that those Centers consistently produced significant amounts of STI. Our evaluation and sampling procedures varied depending on whether the Center used an automated or a paper-based system to track the review process.

To address the congressional request, we surveyed 287 STI authors concerning suppression of NASA research at the four Centers included in our audit. We also reviewed the 19 STI items at Johnson and Langley that were released after being rejected and searched for trends, such as high instances of rejection for any individual STI topic or author. The scope of this audit was limited to the STI review process that is required by NASA. This audit did not address specific allegations that NASA scientists were not allowed to express their views through public appearances or through NASA-sponsored press releases. These specific allegations were addressed in an administrative investigation and the results of that investigation were reported separately.

Sampling Methodology. For Johnson and Langley, the Centers using an automated tracking system, we initially analyzed the review and approval dates for all STI processed in FY 2005 and FY 2006. We performed this analysis to identify STI that, according to the dates in the automated system, were released prior to the completion of the review process. Our initial analysis of the records contained in Johnson's automated system indicated that 1,369 STI items were released in FY 2005 and FY 2006, and 478 of those appeared to have been released either prior to approval or after rejection. Our initial analysis of the records contained in Langley's automated system indicated that 3,260 STI items were released in FY 2005 and FY 2006, and 441 of those items appeared to have been released either prior to approval or after rejection. To verify the results of our initial analysis, we applied the Discovery Acceptance Sampling Approach (discovery sampling), under the guidance of the Defense Contract Audit Agency.

Discovery sampling is an acceptance sampling approach that produces a minimal sample size and can be used to accept a population if the sample is error free. This approach allowed us to obtain a statistical sample of only those items that appeared to have been released prior to approval, or after rejection, based on the information contained in the automated systems. We used EZ-Quant sampling software to determine the discovery sample size and to generate random numbers. We selected an error rate of 5 percent and a precision range of 5 percent, which generated a confidence level of 95 percent. Using discovery sampling methodology and the attributes mentioned above, we sampled 160 of the 478 STI items at Johnson. Of the 160 items we sampled at Johnson, we identified data errors with 55 items and were unable to verify the data for an additional 30 items. At Langley, we sampled 153 of the 441 STI items and identified data errors or were unable to verify the data for 88 items. We were unable to verify the data because we could not locate the author or obtain a copy of the STI, or the author recalled the STI. Because we could not verify the data for all of the sampled items, we could not project the results of the discovery samples.

For Goddard and Marshall, the Centers using a paper-based process to review STI, we obtained a list of STI approved for release in FY 2005 and FY 2006 from the STI Managers and applied a statistical random sampling methodology to select specific STI for in-depth review. The in-depth review consisted of verifying the dates contained on the NASA Form 1676. We verified those dates by surveying the authors and obtaining copies of the STI items. At both Goddard and Marshall, we selected an error rate of 5 percent and a precision range of 5 percent, which generated a confidence level of 95 percent. During FY 2005 and FY 2006, Goddard approved 2,196 STI items for release and Marshall approved 1,556 STI items for release. Using random sampling, we selected for review 290 of Goddard's 2,196 STI items and 280 of Marshall's 1,556 STI items.

To identify STI that had never been submitted for review, we selected 20 conferences held during FY 2005 and FY 2006 where NASA STI was released. We reviewed the conference agendas, abstract books, and program guides contained on the conference Web sites to identify NASA STI that may have been presented. We obtained the title,

author's name, and author's Center for each item of NASA STI. When possible, we also obtained a copy of the STI. We limited our search to STI presented by NASA personnel who worked at Goddard, Johnson, Langley, or Marshall. To determine whether the STI had been submitted for review, we searched the Centers' STI records and the CASI database. We also contacted the authors in some cases.

Use of Computer-Processed Data. During the audit, we used computer-processed data from the CASI STI database and the Johnson and Langley automated systems. We primarily used the CASI database to obtain hardcopy documentation of STI items. We verified the data we obtained from CASI with outside sources. If we could not verify the data, the STI item was not included in our audit. We used the Centers' automated systems to perform preliminary reviews, but verified system data with outside sources. We considered the data in the Johnson and Langley systems to be unreliable because of incorrect dates for STI approval and release that we identified. However, because we used only the information that could be verified, the reliability of the data does not affect our findings.

Review of Internal Controls

To assess whether internal controls were adequate to identify and prevent the inappropriate release of STI, we reviewed controls over the STI review process at Goddard, Johnson, Langley, and Marshall. Specifically, we reviewed internal controls associated with STI submitted through the review process and controls associated with monitoring for STI that was never submitted through the process. We identified internal control weaknesses with communicating STI guidance, with notifying authors that the STI review process was completed, and with oversight activities that should ensure the STI review process is operating effectively. The internal control weaknesses are discussed in this report, and corrective actions taken in response to our recommendations should improve internal controls over the STI review process and oversight activities.

Prior Coverage

During the last 5 years, GAO issued one report of particular relevance to the subject of our audit, "Federal Research: Policies Guiding the Dissemination of Scientific Research from Selected Agencies Should Be Clarified and Better Communicated" (GAO-07-653, May 2007). Unrestricted GAO reports can be accessed over the Internet at <http://www.gao.gov>.

NASA FORM 1676

National Aeronautics and Space Administration		NASA Scientific and Technical Information (STI) Document Availability Authorization (DAA) <i>(Instructions for completing this form are on page 4)</i>		<input type="checkbox"/> NEW DAA <input type="checkbox"/> REVISION TO EXISTING DAA <i>(Attach Copy)</i>
SECTION 1				
1a. DOCUMENT IDENTIFICATION				
TITLE		AUTHOR(S)		
POINT OF CONTACT <i>(If different from author)</i>	E-MAIL	ADDRESS		
COTR OR CENTER-DESIGNATED OFFICIAL	E-MAIL	ADDRESS		
ORIGINATING NASA CENTER AND ORGANIZATION		PERFORMING NASA CENTER AND ORGANIZATION <i>(If different)</i>		
CONTRACT NUMBER	GRANT NUMBER	INTERAGENCY NUMBER	OTHER DOCUMENT NUMBER(S)	
1b. TYPE OF STI				
<input type="checkbox"/> ABSTRACT <input type="checkbox"/> BOOK NAME OF PUBLISHER: _____ <input type="checkbox"/> CONFERENCE PAPER <input type="checkbox"/> CONFERENCE PRESENTATION CONFERENCE NAME/SPONSOR: _____ CONFERENCE LOCATION: _____ DATES: _____ TO: _____ <input type="checkbox"/> ORAL/VISUAL PRESENTATION ADDITIONAL INFORMATION: _____ <input type="checkbox"/> NASA STI SERIES REPORT <i>(See NPR 2200.2)</i> <input type="checkbox"/> TECHNICAL PUBLICATION (TP) <input type="checkbox"/> TECHNICAL MEMORANDUM (TM) <input type="checkbox"/> CONTRACTOR REPORT (CR) <input type="checkbox"/> CONFERENCE PUBLICATION (CP) <input type="checkbox"/> SPECIAL PUBLICATION (SP) <input type="checkbox"/> TECHNICAL TRANSLATION (TT)		<input type="checkbox"/> DOCUMENT FOR PUBLIC WEB SITE <i>(Must meet requirements in NPR 2810.1, chapter 11, for publishing on the Internet)</i> <input type="checkbox"/> DOCUMENT FOR INTERNAL NASA WEB SITE URL: _____ PERSISTENT URL <i>(If applicable)</i> : _____ <input type="checkbox"/> OTHER <i>(Periodical, format, etc.)</i> <input type="checkbox"/> JOURNAL ARTICLE JOURNAL NAME/PUBLISHER: _____ <input type="checkbox"/> IF A PREPRINT <i>(draft or revision being sent to journal)</i> , DO YOU WANT IT DISSEMINATED TO: <input type="checkbox"/> ONLY THE PUBLISHER <input type="checkbox"/> NASA AND ITS CONTRACTORS <input type="checkbox"/> US GOVERNMENT AGENCIES AND THEIR CONTRACTORS <input type="checkbox"/> PUBLIC <input type="checkbox"/> IF A REPRINT <i>(article published by journal)</i> BEING SENT TO NASA CENTER FOR AEROSPACE INFORMATION TO ADD TO STI DATABASE, DID YOU GET PERMISSION FROM THE PUBLISHER TO DISTRIBUTE TO PUBLIC? <input type="checkbox"/> YES <i>(Attach copy of permission)</i> <input type="checkbox"/> NO		

2. NATIONAL SECURITY CLASSIFICATION (Check one)	
<input type="checkbox"/> NONE (Unclassified) <input type="checkbox"/> CONFIDENTIAL <input type="checkbox"/> SECRET <input type="checkbox"/> TOP SECRET	
IF CLASSIFIED, CENTER SECURITY OFFICER (CSO) MUST APPROVE	
CSO APPROVAL (Name)	
3. AVAILABILITY CATEGORY	
3a. PUBLICLY AVAILABLE STI (See instructions)	
<input type="checkbox"/> YES <input type="checkbox"/> NO (See 3 (b, c, and/or d) and 4)	
3b. EXPORT-CONTROLLED INFORMATION (Contact your Export Control Administrator for help)	
<input type="checkbox"/> INTERNATIONAL TRAFFIC IN ARMS REGULATIONS (ITAR) GIVE THE US MUNITIONS LIST (USML) CATEGORY: _____	<input type="checkbox"/> EXPORT ADMINISTRATION REGULATIONS (EAR) GIVE THE EXPORT CONTROL CLASSIFICATION NUMBER (ECCN): _____ OF THE COMMERCE CONTROL LIST (CCL)
3c. PROPRIETARY/SENSITIVE INFORMATION (See NPR 2200.2, Chapter 4)	
<input type="checkbox"/> LIMITED RIGHTS DATA <input type="checkbox"/> SMALL BUSINESS INNOVATION RESEARCH (SBIR/STTR) <input type="checkbox"/> LIMITED UNTIL DATE (mm/dd/yyyy): _____ <input type="checkbox"/> IMMEDIATE RELEASE APPROVED TO CATEGORIES INDICATED IN 3d <input type="checkbox"/> TRADE SECRET/COMMERCIAL CONFIDENTIAL OTHER THAN LIMITED RIGHTS OR SBIR DATA <input type="checkbox"/> LIMITED UNTIL DATE (mm/dd/yyyy): _____ <input type="checkbox"/> IMMEDIATE RELEASE APPROVED TO CATEGORIES INDICATED IN 3d	<input type="checkbox"/> PRODUCED UNDER SPACE ACT AGREEMENT & SUBJECT TO § 303(b) OF THE SPACE ACT <input type="checkbox"/> LIMITED UNTIL DATE (mm/dd/yyyy): _____ <input type="checkbox"/> IMMEDIATE RELEASE APPROVED TO CATEGORIES INDICATED IN 3d <input type="checkbox"/> COPYRIGHTED (If copyrighted, check with Center Patent or Intellectual Property Counsel) <input type="checkbox"/> CAN BE RELEASED TO PUBLIC (Attach approval) <input type="checkbox"/> MUST BE RESTRICTED TO CATEGORIES INDICATED IN 3d <input type="checkbox"/> CONTAINS PUBLIC-WEB-SENSITIVE INFORMATION PER NPR 2810.1 <input type="checkbox"/> DOCUMENT DISCLOSING AN INVENTION (Complete Section 4)
NAME OF APPROVING OFFICIAL	TITLE OF APPROVING OFFICIAL
3d. DISTRIBUTION LIMITATIONS (See instructions)	
<input type="checkbox"/> US GOVERNMENT AGENCIES AND US GOVERNMENT AGENCY CONTRACTORS ONLY <input type="checkbox"/> US GOVERNMENT AGENCIES ONLY <input type="checkbox"/> NASA PERSONNEL AND NASA CONTRACTORS ONLY <input type="checkbox"/> NASA CONTRACTORS AND US GOVERNMENT ONLY <input type="checkbox"/> NASA PERSONNEL ONLY	<input type="checkbox"/> US PERSONS* WITH A NEED TO KNOW AND A SIGNED NDA** (See instructions) <input type="checkbox"/> AVAILABLE ONLY WITH APPROVAL OF THE FOLLOWING ISSUING OFFICE: <input type="checkbox"/> LIMITED UNTIL DATE (mm/dd/yyyy): _____
4. DOCUMENT DISCLOSING AN INVENTION	
<input type="checkbox"/> CHECK IF THIS DOCUMENT/PRESENTATION DISCLOSES AN INVENTION AND ROUTE TO HQ OR CENTER PATENT OR INTELLECTUAL PROPERTY COUNSEL (See instructions)	
I CERTIFY THAT THIS DOCUMENT MAY BE RELEASED ON (mm/dd/yyyy): _____	
PATENT COUNSEL NAME	DATE

5. BLANKET AVAILABILITY AUTHORIZATION (Optional) (See instructions)			
<input type="checkbox"/> I APPROVE ALL DOCUMENTS ISSUED UNDER THE FOLLOWING CONTRACT, GRANT, OR PROJECT NUMBER TO BE PROCESSED AS CHECKED IN SECTIONS 2 AND 3(a-d) I GRANT THIS AVAILABILITY AUTHORIZATION ON (mm/dd/yyyy): _____			
<input type="checkbox"/> CONTRACT NUMBER <input type="checkbox"/> GRANT NUMBER <input type="checkbox"/> PROJECT NUMBER <input type="checkbox"/> TASK NUMBER			
APPROVING OFFICIAL	ORG CODE	E-MAIL	DATE
I HEREBY CHANGE THE BLANKET AVAILABILITY AUTHORIZATION DATED (mm/dd/yyyy): _____ <input type="checkbox"/> RESCINDED - FUTURE DOCUMENTS MUST HAVE INDIVIDUAL DOCUMENT AVAILABILITY AUTHORIZATIONS <input type="checkbox"/> MODIFIED - LIMITATIONS ON ALL DOCUMENTS SHOULD BE CHANGED TO CONFORM TO BLOCKS AS CHECKED IN SECTIONS 2 AND 3			
NAME	ORG CODE	E-MAIL	DATE
6. AUTHOR/ORIGINATOR VERIFICATION			
I BELIEVE THAT THIS PUBLICATION: <input type="checkbox"/> DOES CONTAIN ITAR/EAR/EXPORT-CONTROLLED, PROPRIETARY/SENSITIVE INFORMATION, AND/OR DISCLOSES AN INVENTION AND THE APPROPRIATE LIMITATION IS CHECKED IN SECTIONS 3 AND/OR 4 <input type="checkbox"/> DOES NOT CONTAIN ITAR/EAR/EXPORT-CONTROLLED, PROPRIETARY/SENSITIVE INFORMATION, NOR DOES IT DISCLOSE AN INVENTION AND MAY BE RELEASED AS INDICATED ABOVE			
NAME	ORG CODE	E-MAIL	DATE
7. NASA PROJECT OFFICIAL (COTR/designated official, or Technical Monitor) / DIVISION CHIEF REVIEW OF 1 THROUGH 6			
<input type="checkbox"/> APPROVED FOR DISTRIBUTION AS MARKED <input type="checkbox"/> NOT APPROVED (Give reason)		REASON:	
NAME	TITLE	E-MAIL	DATE
8. EXPORT CONTROL ADMINISTRATOR CONFIRMATION			
<input type="checkbox"/> PUBLIC RELEASE IS APPROVED (Information is not export controlled.) <input type="checkbox"/> EXPORT-CONTROLLED LIMITATIONS IN BLOCKS 3b, 3d, AND 6 ARE APPROVED AND ASSIGNED TO THIS DOCUMENT		<input type="checkbox"/> EXPORT-CONTROLLED LIMITATION(S) INDICATED IN SECTIONS 3b AND 3d HAVE BEEN CHANGED TO: ITAR USML CATEGORY: _____ NUMBER: _____ EAR OCL ECCN NUMBER: _____	
CENTER/HQ EXPORT CONTROL ADMINISTRATOR NAME		E-MAIL	DATE
9. FINAL APPROVAL BY PROGRAM MANAGER			
<input type="checkbox"/> APPROVED FOR DISTRIBUTION AS MARKED <input type="checkbox"/> NOT APPROVED (Give reason)		REASON:	
DATE DOCUMENT PUBLISHED/RELEASED: _____			
NAME	E-MAIL	DATE	
10. DISPOSITION			
ADDITIONAL APPROVALS BY CENTER, IF APPLICABLE (OPTIONAL):			
NAME/TITLE: _____	E-MAIL: _____	DATE: _____	
NAME/TITLE: _____	E-MAIL: _____	DATE: _____	
SEND TO CENTER DAA REPRESENTATIVE (SEE INSTRUCTIONS)			
<input type="checkbox"/> SEND TO CENTER TECHNICAL PUBLICATIONS OFFICE		<input type="checkbox"/> SEND TO NASA CENTER FOR AEROSPACE INFORMATION (e-mail: ncp@st.nasa.gov)	
NAME OF DAA REPRESENTATIVE			DATE

INSTRUCTIONS FOR COMPLETING NF 1676			
<p>When to Use. Use for STI to be published, released, or presented external to NASA or presented at internal meetings or conferences at which foreign nationals may be present. NPD 2200.1 gives authority and defines STI. See also NPR 2200.2. Encrypt electronic STI that is limited/restricted or export-controlled (NPD 2091.1). Do not enter classified information on this form (use unclassified information about the document). See also <http://www.sti.nasa.gov/nasaonly/publish/publish.html>.</p> <p>Approvals. NASA centers have different workflows to accommodate this form. A typical approval cycle is given below; however, check with your center Document Availability Authorization (DAA) representative or STI Manager to see if your center has an alternative workflow and information on electronic routing. Steps include:</p> <ol style="list-style-type: none"> 1. Author, contracting officer's technical representative (COTR), or NASA official completes blocks 1 and 2. 2. If STI is classified, Center Security Officer (CSO) approves block 2. 3. Author, COTR, or NASA official <u>recommends</u> information in blocks 3, 4, and 6, as appropriate. 4. If the document or presentation contains information that discloses an invention, the HQ or Center Patent or Intellectual Property Counsel must approve the release in block 4. Patent Counsel approval may be required for all STI; check with your DAA representative or STI Manager. 5. Block 5 is OPTIONAL. This block can be used when all STI under a specific contract, grant, project, or task <u>number</u> is approved to have the same distribution. One approved NF 1676 must be on file that cites the specific <u>number</u>. All subsequent STI must contain the cited <u>number</u>. You must provide a copy of the approved NF 1676 on file with each STI item. 6. NASA Project Official, COTR, or technical monitor (for STI from contractor that NASA elects to publish) and Division Chief (for NASA-authored STI) approves in block 7. Supervisor should review prior to having Division Chief approve. 7. Center Export Control Administrator (CEA) certifies in block 8 that the information in blocks 3b, 3d and 6 is correct or corrects the information. 8. Approving official for the center (program manager) approves in block 9. 9. If center requires additional approvals, use block 10. 10. Send STI to DAA representative and technical publications office. DAA representative sends an electronic copy of STI and NF 1676 to the NASA Center for Aerospace Information (CASI) for inclusion in the NASA Aeronautics and Space Database (http://www.sti.nasa.gov). <p>Validation of Signature. The following are acceptable methods to provide the official signatures of personnel who approve blocks 2 through 10. The approver may sign digitally (preferred if digital signature is available at the center); or may type his/her name directly into the electronic form; or the author/originator may print the form, have approvers sign it, and scan it to PDF for electronic retention.</p> <p>Items to Know (Instructions for completing blocks 1-10 of NF 1676)</p> <ol style="list-style-type: none"> 1. Check "new" or "revision" blocks. 1a. List authors' names in same order and with exact names as on document. For contractor or grantee STI that NASA elects to publish, COTR initiates NF 1676. 1b. Journal article. Decide who you wish to receive your preprint. NASA has the right to release preprints to the public, but not all authors approve this. Unless the publisher has added copyrighted information (e.g., peer review comments, or publisher-prepared summary or abstract) to the published version of a journal article (reprint), NASA has the right to release the reprint for governmental purposes, which includes release to U.S. Government personnel, contractors, and the public. If copyrighted materials are added by the publisher, NASA does not have the right to release reprints without the publisher's permission. See Chapter 4 of NPR 2200.2 and NPR 2310.1. 2. See Chapter 5 of NPR 1600.1. 3. See NPR 2200.2, Chapter 4. If you do not mark Publicly Available in 3a, you must indicate a distribution limitation in 3c. See NPR 1600.1 for Sensitive But Unclassified (SBU) information. For SBU categories that are not listed on this form, indicate a distribution limitation in 3d and attach the SBU cover sheet, NF 1656. 3a. Publicly Available means the STI is unclassified, does not contain export-controlled information (3b) or proprietary information (3c), has no distribution limitations (3d), and if it contains information disclosing an invention (4), it has been cleared by the HQ or Center Patent or Intellectual Property Counsel. 3b. See NPR 2190.1. 3c. Information marked in this section must be re-reviewed by the originating organization following the "limited until (date)" and a modified DAA must be done before release indicated in 3d can be changed. For information on copyrights, see NPR 2200.2 and contact your center attorney. SBIR is Small Business Innovation Research. STTR is Small Business Technology Transfer. See NPR 2200.2, Chapter 4. 3d. If you do <u>not</u> mark Publicly Available in 3a, indicate who can see and receive your document in 3d. Restriction statements must appear on cover, title page, and SF 298 (if applicable). 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Use this option when you approve or rescind all STI produced under a specific contract, grant, project, or task <u>number</u> to have the same distribution. See Approvals above. 6. As the author, indicate whether or not the information contains export-controlled or proprietary/sensitive information or discloses an invention. Your CEA will verify in block 8 whether information contains export-controlled information. 7. If the distribution is not approved, indicate the reason. As a reminder, the author's supervisor should always review the document prior to having it approved by the approving official (Division Chief) in this block. 8. CEA certifies information in 3b, 3d and 6. 9. Center approving official indicates final approval to publish under the conditions cited on this form. 10. For contractor-generated STI that NASA elects to publish, the NASA responsible official or technical publications office notifies the COTR (or center-designated official) when the document is approved for publication. COTR/center official notifies the contractor. <table style="width: 100%; border: none;"> <tr> <td style="width: 50%; vertical-align: top; border: none;"> <p>Additional Help:</p> <ul style="list-style-type: none"> o Classified and Sensitive But Unclassified - NPR 1600.1 o Export-controlled information - NPD and NPR 2190.1 o Disclosing an invention - NPD 2091.1 </td> <td style="width: 50%; vertical-align: top; border: none;"> <p>Following Forms are Related to Approval Process:</p> <ul style="list-style-type: none"> o SF 298, "Report Documentation Page," required for NASA STI-Series reports o NF 1606, "Sensitive But Unclassified (SBU)" o NF 1679, "Disclosure of Invention and New Technology (Including Software)" </td> </tr> </table>		<p>Additional Help:</p> <ul style="list-style-type: none"> o Classified and Sensitive But Unclassified - NPR 1600.1 o Export-controlled information - NPD and NPR 2190.1 o Disclosing an invention - NPD 2091.1 	<p>Following Forms are Related to Approval Process:</p> <ul style="list-style-type: none"> o SF 298, "Report Documentation Page," required for NASA STI-Series reports o NF 1606, "Sensitive But Unclassified (SBU)" o NF 1679, "Disclosure of Invention and New Technology (Including Software)"
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<p>NASA FORM 1676 AUG 07 PREVIOUS EDITIONS ARE OBSOLETE. PAGE 4 OF 4</p>			

MANAGEMENT COMMENTS

National Aeronautics and Space Administration
 Headquarters
 Washington, DC 20546-0001



Reply to Attn of: Office of Chief Information Officer

TO: Inspector General

FROM: NASA Chief Information Officer

08-04-03 P03:30 IN

SUBJECT: Response to Draft Audit Report - Assignment No. A-06-026-00, Audit of NASA's Scientific and Technical Information (STI) Program

The NASA Chief Information Officer (OCIO) is pleased to provide the following consolidated management comments in response to the subject draft report for Assignment No. A-06-026-00. This response specifically addresses each of the three Office of Inspector General (OIG) recommendations with regard to improving NASA's Scientific and Technical Information Program

OIG Recommendations for Corrective Action:

Recommendation 1: *The Center Directors at Goddard, Johnson, Langley, and Marshall, in coordination with the Center STI Managers, should establish and implement a plan to increase awareness of STI review requirements contained in NPR 2200.2B.*

Goddard Space Flight Center Response:

Concur. GSFC has established and is implementing a plan to increase Center awareness of the STI review requirements contained in NPR 2200.2B. The GSFC plan addresses three areas of STI requirements and awareness as follows:

- Center Policy – The GSFC STI Manager will coordinate the development, review, approval, and issuance of Center STI policy in the form of a Goddard Procedural Requirements (GPR) policy document by October 7, 2008.
- Outreach Initiatives to Promote Customer Awareness – Outreach initiatives include general briefings, meetings with customers, *Goddard Dateline* articles, and an informational brochure. The GSFC STI Program Office conducted two general session briefings in May and August 2007 with a third briefing scheduled in April 2008. The Center Export Control Office also includes STI process information in its briefings to customers. The GSFC STI Program Office conducts one-on-one meetings with customers to discuss the protocols for submitting technical reports and Documents Availability

Authorization (DAA) review and approval procedures. These meetings focus on the organizations that produce the most STI, especially in the GSFC Sciences and Exploration Directorate, and are conducted as needed. Articles are published bi-monthly in the *Goddard Dateline*, the daily automated Center newsletter that goes to all GSFC employees via electronic mail, to publicize STI briefings and promote various aspects of the STI program. The GSFC STI Program Office will publish a new tri-fold brochure in April 2008 with Center-wide distribution. The brochure will be a handy reference tool that focuses on the key aspects of the STI program and will be reviewed semi-annually for revision as needed.

- Timely Notification of Discrepancies to Authors and Approvers – In February 2008, the GSFC STI Program Office implemented a process to notify authors in writing when DAA Form 1676 packages are incomplete or improperly prepared. This process increases author/approver awareness regarding the appropriate protocols for completing the DAA package. In October 2007, the GSFC Export Control Office, in collaboration with the GSFC STI Program Office, implemented a process to notify authors when DAA Forms 1676 are submitted with signatures out of sequence, reinforcing the need for authors and approvers to be cognizant of the rules governing the DAA form approval process. The GSFC STI Program Office will continue internal quality control reviews and written notification to customers when discrepancies are identified.

The GSFC STI Manager's FY08-09 performance plan will be updated May 1, 2008, to include the following program objectives that were discussed above: issuance of the new STI Program GPR, conduct of quarterly general briefings, publishing of bi-monthly *Goddard Dateline* articles, and semi-annual review of the STI brochure with revisions as needed. The ongoing activities of the GSFC STI Program Office will continue as discussed above, and implementation of the planned actions will be completed by October 7, 2008.

Johnson Space Center Response:

Concur. The review showed that the JSC personnel conducting export control reviews are fully qualified, and found no evidence that the STI review process at JSC was used to suppress scientific research. The OIG review included releases for Fiscal Years 2005 and 2006 only. We do not agree with the number of documents released prior to STI review or approval during that time period, as stated in our comments to the preliminary audit findings. We continue to improve our automated tracking system, having expanded an automated notification system informing of approvals and rejections to include authors. And we have made periodic notices to all employees to ensure awareness of the STI process.

To increase awareness of the STI requirements, articles were posted on *JSC Today*, an automated release via electronic mail to all JSC civil servants and on-site contractors. One article was posted on January 3, 2007, highlighting the Document Availability

Authorization (DAA) process used to seek approval for external release. Another was posted on January 11, 2008, announcing the release of the revision to NPD 2200.1A "Management of NASA Scientific and Technical Information," and explaining its intent. Evidence of these postings has been provided to the audit staff.

To expand on those efforts, we have created and are implementing the following plan for increasing Center awareness of the STI review requirements. This plan is expected to be implemented by October 7, 2008. The strategy will be two pronged, creating the broadest possible reach to educate users of the requirement, and also targeting the highest use organizations with a more directed message. To address the entire Center, we plan to:

- Release regularly scheduled *JSC Today* announcements describing the requirement and directing readers to an educational presentation housed on the Information Resources Directorate (IRD) website.
- Give that same presentation quarterly at IRD's Customer forum and IT Steering Council.
- Meet quarterly with the IRD customer service agents and establish a domino educational chain.
- Work with Human Resources to add an STI element to new employee orientation.
- Target the highest use organizations where the largest percentage of total JSC STI items are released; we will meet with those organizations; identify the best forums for presenting the DAA briefing; and set a schedule.

Langley Research Center Response:

Concur. The Langley Office of the Chief Information Officer in coordination with the Center STI Manager has developed a STI awareness plan for Center implementation. Immediate action will be taken to implement this plan. Implementation of this plan is targeted for October 7, 2008.

The policy and requirements of the NASA STI Program need to be reemphasized at the Center to ensure that NASA's scientific and technical information is properly protected and preserved. The following actions will be taken to ensure that all employees are aware of the policies and requirements for the documentation, approval, and dissemination of NASA STI:

- Center Director E-mail Communication (CD COMM) to all employees, emphasizing the NASA requirement that all STI must be approved prior to publication or dissemination in any media;

- Organizational Briefings to ensure that managers and authors are aware of the NASA STI review requirements (Center STI Manager);
- Presentations to New Employees to make them aware of the NASA policies and regulations for the review, approval, and dissemination of STI (Center STI Manager);
- Quarterly Center Awareness Announcements on @LaRC re-emphasizing the NASA STI review requirements and the availability of the following STI training classes available through SATERN (Publications Manager/DAA Representative);
- Conduct NASA Scientific and Technical Information (STI) Training – COURSE OTH-004-03;
- Review and Approval of NASA Scientific and Technical Information (STI): NASA Form 1676 - STI Document Availability Authorization (DAA) – COURSE OTH-001-07; and
- Develop a publishing guide/brochure for online and paper dissemination (Publications Manager/DAA Representative).

Langley has already implemented an e-mail notification to NASA authors advising them of approval/disapproval of their STI submission through the Technical Publication Submittal and Approval System (TPSAS).

Marshall Space Flight Center Response:

Concur. In March 2008, the Marshall Office of the Chief Information Officer in coordination with the Center STI Manager, established and implemented a plan to increase awareness of the STI review requirements contained in NPR 2200.2B. Closure for MSFC is requested upon issuance of the final OIG report. The implementation plan has been approved by the Center Director and will be submitted separately to the OIG.

Some employees may not be fully aware of their responsibilities for documentation, approval, and dissemination of NASA STI. This necessitates the need for Marshall to reemphasize the policy and requirements of NASA's STI program and employee responsibilities to protect and preserve the Agency's scientific and technical information assets. As a result, Marshall proposes the following corrective action steps to increase employee knowledge and understanding of STI requirements and ensure the effectiveness of the STI program:

- Notify and clarify to all Marshall management and employees that they may not submit any STI for publication/dissemination without a signed/approved Form 1676. This will be accomplished through a memorandum to all employees regarding their responsibilities under the NASA STI program.
- MSFC managers will be held accountable for ensuring their employees follow established policy regarding documentation, publication, and dissemination of NASA STI.
- Increase communications awareness of STI Requirements to Marshall employees.
- Re-institute the concept of quarterly “Weekly Bulletin” notices – a reminder notice that would go out via Inside Marshall and/or Center-wide television.
- Continue offering individual STI briefings to organizations. Take a pro-active approach to identify and target organizations that typically produce STI.
- Update Marshall STI Web site with additional information emphasizing STI awareness and include a frequently asked questions (FAQ) section.
- Evaluate modifying the quarterly training classes for COTRs to give added emphasis to the importance of the STI review process.
- Re-emphasize training available through SATERN.
- Reinstate the STI program overview as part of future new employee orientation classes and require all new employees to take the two SATERN training classes on NASA STI as part of their new employee orientation.
- Require all managers and supervisors to take the two available training classes offered in SATERN. This will help ensure that management is fully aware of the requirements for documentation, approval, and dissemination of NASA STI.
- Require all employees to take the two available training classes and make the STI SATERN training class part of every employee’s required annual training plan. Employees who actually need to complete DAAs can take the DAA class as a refresher if needed.
- Conduct a review of MPR 2220.1, “Scientific and Technical Publications,” for clarity of requirements. Revise as appropriate.
- Apply Lean Six Sigma process improvement techniques to the current manual process for Form 1676 processing to identify process waste and recommend improvements to reduce the time required for review/approval of STI items.

The focus of the Value Stream Assessment will be to improve the quality and accuracy of Form 1676 preparation and processing, and reduce time required for final approval/rejection and notification to STI author. This will ensure a more effective closed-loop process from inception to completion and timely notification of status back to the STI author.

In the interim:

- Clarify and notify all Marshall employees that they may not submit any STI for publication/dissemination without a signed/approved Form 1676. No exceptions. This will be accomplished through a memorandum to all employees regarding their responsibilities under the NASA STI program.
- Require authors to provide an electronic copy of their STI document (with the DAA) to the Head of Technical Publications at the beginning of the process (before it goes into the organization's signature cycle) thus allowing the Marshall STI Manager and Technical Publications Head to identify problems with how the DAA is filled out before it goes into the approval process. At the end of the process, send an electronic pdf file of the DAA to the author to reduce the time required to notify the author of approval/rejection.
- For high profile organizations that generate significant amounts of STI, evaluate establishing STI liaisons similar to that provided in records management and forms management functions to help increase awareness and ensure effectiveness of STI program activities.

Recommendation 2: *The CIO should revise NPR 2200.2B to require that Center STI Managers timely notify STI authors as to whether their STI was approved or rejected for release and to prohibit STI authors from publicly releasing STI before approval notification is received.*

OCIO Response:

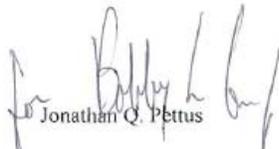
Concur. The STI Program, through NODIS, will issue a NASA Interim Directive (NID) that will remain in effect until these changes can be included in the next full regular revision of both the NPD and NPR 2200. The NID is expected to be completed by October 7, 2008. The NID will reinforce the existing requirement for Centers to review all STI in a timely manner prior to release. It will also add a new requirement, which is for the Centers to implement a process to notify the STI submitter (author, initiator, etc.) if the STI is or is not approved via the NF-1676 immediately upon final approval or disapproval of the STI.

Recommendation 3: *The CIO should revise NPD 2200.1 to include "effectiveness of the STI review process" as one of the annual performance measures used to determine whether NASA is achieving compliance with the policy directive.*

OCIO Response:

Concur. The STI Program, through NODIS, as indicated in the management response to Recommendation 2, will issue a NID and include the following changes in upcoming full revisions of the NPD and NPR 2200 to include "effectiveness of the STI review process" as an annual performance measure. The expected completion date to this corrective action is October 7, 2008.

If you have any questions concerning this memorandum, please direct them to George Roncaglia at 757-864-2374.


Jonathan Q. Pettus

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Subcommittee on Investigations and Oversight
Subcommittee on Space and Aeronautics

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June 2, 2008

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