AUTHENTICATED
U.S. GOVERNMENT
INFORMATION
GPO

THE NATIONAL ARCHIVES AND RECORDS ADMINISTRATION

HEARING

BEFORE THE

SUBCOMMITTEE ON GOVERNMENT MANAGEMENT, INFORMATION, AND TECHNOLOGY

OF THE

COMMITTEE ON GOVERNMENT REFORM

HOUSE OF REPRESENTATIVES

ONE HUNDRED SIXTH CONGRESS

FIRST SESSION

OCTOBER 20, 1999

Serial No. 106–121

Printed for the use of the Committee on Government Reform



Available via the World Wide Web: http://www.gpo.gov/congress/house
http://www.house.gov/reform

U.S. GOVERNMENT PRINTING OFFICE

64–651 CC WASHINGTON : 2000

COMMITTEE ON GOVERNMENT REFORM

DAN BURTON, Indiana, *Chairman*

BENJAMIN A. GILMAN, New York
CONSTANCE A. MORELLA, Maryland
CHRISTOPHER SHAYS, Connecticut
ILEANA ROS-LEHTINEN, Florida
JOHN M. MCHUGH, New York
STEPHEN HORN, California
JOHN L. MICA, Florida
THOMAS M. DAVIS, Virginia
DAVID M. MCINTOSH, Indiana
MARK E. SOUDER, Indiana
JOE SCARBOROUGH, Florida
STEVEN C. LATOURETTE, Ohio
MARSHALL "MARK" SANFORD, South Carolina
BOB BARR, Georgia
DAN MILLER, Florida
ASA HUTCHINSON, Arkansas
LEE TERRY, Nebraska
JUDY BIGGERT, Illinois
GREG WALDEN, Oregon
DOUG OSE, California
PAUL RYAN, Wisconsin
HELEN CHENOWETH-HAGE, Idaho
DAVID VITTER, Louisiana

HENRY A. WAXMAN, California
TOM LANTOS, California
ROBERT E. WISE, JR., West Virginia
MAJOR R. OWENS, New York
EDOLPHUS TOWNS, New York
PAUL E. KANJORSKI, Pennsylvania
PATSY T. MINK, Hawaii
CAROLYN B. MALONEY, New York
ELEANOR HOLMES NORTON, Washington, DC
CHAKA FATTAH, Pennsylvania
ELIJAH E. CUMMINGS, Maryland
DENNIS J. KUCINICH, Ohio
ROD R. BLAGOJEVICH, Illinois
DANNY K. DAVIS, Illinois
JOHN F. TIERNEY, Massachusetts
JIM TURNER, Texas
THOMAS H. ALLEN, Maine
HAROLD E. FORD, JR., Tennessee
JANICE D. SCHAKOWSKY, Illinois

BERNARD SANDERS, Vermont (Independent)

KEVIN BINGER, *Staff Director*
DANIEL R. MOLL, *Deputy Staff Director*
DAVID A. KASS, *Deputy Counsel and Parliamentarian*
CARLA J. MARTIN, *Chief Clerk*
PHIL SCHILIRO, *Minority Staff Director*

SUBCOMMITTEE ON GOVERNMENT MANAGEMENT, INFORMATION, AND TECHNOLOGY

STEPHEN HORN, California, *Chairman*

JUDY BIGGERT, Illinois
THOMAS M. DAVIS, Virginia
GREG WALDEN, Oregon
DOUG OSE, California
PAUL RYAN, Wisconsin

JIM TURNER, Texas
PAUL E. KANJORSKI, Pennsylvania
MAJOR R. OWENS, New York
PATSY T. MINK, Hawaii
CAROLYN B. MALONEY, New York

EX OFFICIO

DAN BURTON, Indiana

HENRY A. WAXMAN, California

J. RUSSELL GEORGE, *Staff Director and Chief Counsel*
BONNIE HEALD, *Director of Communications/Professional Staff Member*
CHIP AHLSWEDE, *Clerk*
DAVID MCMILLEN, *Minority Professional Staff Member*

CONTENTS

	Page
Hearing held on October 20, 1999	1
Statement of:	
Carlin, John, Archivist of the U.S. National Archives and Records Administration, accompanied by, Lewis J. Bellardo, Deputy Archivist and Chief of Staff; and Adrienne C. Thomas, Assistant Archivist for Administrative Services	5
Stevens, L. Nye, Director, Federal Management and Workforce Issues, U.S. General Accounting Office; Page Putnam Miller, executive director, National Committee for the Promotion of History, representing the Organization of American Historians; Stanley Katz, vice president for research, American Historical Association; and H. Thomas Hickerson, associate university librarian for information technology, Cornell University, and president, Society of American Archivists	88
Letters, statements, et cetera, submitted for the record by:	
Bellardo, Lewis J., Deputy Archivist and Chief of Staff, information concerning records of party conferences	52
Carlin, John, Archivist of the U.S. National Archives and Records Administration:	
Information concerning grants awarded	64
Prepared statement of	9
Hickerson, H. Thomas, associate university librarian for information technology, Cornell University, and president, Society of American Archivists, prepared statement of	112
Horn, Hon. Stephen, a Representative in Congress from the State of California, prepared statement of	3
Katz, Stanley, vice president for research, American Historical Association, prepared statement of	107
Miller, Page Putnam, executive director, National Committee for the Promotion of History, representing the Organization of American Historians, prepared statement of	102
Stevens, L. Nye, Director, Federal Management and Workforce Issues, U.S. General Accounting Office, prepared statement of	90
Turner, Hon. Jim, a Representative in Congress from the State of Texas, prepared statement of	130

THE NATIONAL ARCHIVES AND RECORDS ADMINISTRATION

WEDNESDAY, OCTOBER 20, 1999

HOUSE OF REPRESENTATIVES,
SUBCOMMITTEE ON GOVERNMENT MANAGEMENT,
INFORMATION, AND TECHNOLOGY,
COMMITTEE ON GOVERNMENT REFORM,
Washington, DC.

The subcommittee met, pursuant to notice, at 10 a.m., in room 2154, Rayburn House Office Building, the Honorable Stephen Horn (chairman of the subcommittee) presiding.

Present: Representatives Horn and Turner.

Staff present: Matthew Ebert, policy advisor; Bonnie Heald, director of communications and professional staff member; Chip Ahlswede, clerk; P.J. Caceres and Deborah Oppenheim, interns; Trey Henderson, minority counsel; David McMillen, minority professional staff member; and Jean Gosa, minority staff assistant.

Mr. HORN. This is the Committee on Government Reform's first oversight hearing on the National Archives and Records Administration since the Honorable John Carlin became the Nation's Archivist in 1995. We welcome Governor Carlin, former Governor of Kansas. He has done a great job as the Archivist and we look forward to having some of that put into the record.

The National Archives and Record Administration is an independent Federal agency charged with preserving the Nation's history through its oversight and management of Federal records. The agency has 33 facilities that hold more than 4 billion pieces of paper generated by all branches of the Federal Government from 1789 up.

Today we will examine one of the agency's essential responsibilities: how it determines which Government records should be preserved and which records may be destroyed. I shudder at the last remark.

The National Archives assists other Federal agencies in maintaining and disposing of Government documents—electronic and paper. The agency is attempting to streamline and revise its guidelines under an 18-month business process reengineering plan and plans to survey Government agencies on their electronic records management programs. The subcommittee will examine the agency's progress on this plan today.

Since President Clinton's 1995 order to declassify historic documents which are 25 years or older, the Federal Government has processed 593 million pages for declassification. The subcommittee

will examine how the National Archives, as a key player, is implementing this process in meeting its declassification deadlines.

In addition, we want to examine the viability of the National Archives' revolving fund. The fund, which was established last year, was set up as a mechanism for Federal departments and agencies to reimburse the National Archives for the expenses it incurs for storage of temporary records.

We welcome our witnesses today. We look forward to each of their testimonies.

We will proceed and yield to Mr. Turner when he comes in shortly.

[The prepared statement of Hon. Stephen Horn follows:]

DAN BURTON, INDIANA,
CHAIRMAN
BENJAMIN A. GILMAN, NEW YORK
CONSTANCE A. MORELLA, MARYLAND
CHRISTOPHER SHAYS, CONNECTICUT
ILEANA ROS-LEHTINEN, FLORIDA
JOHN M. McHUGH, NEW YORK
STEPHEN HORN, CALIFORNIA
JOHN L. MICA, FLORIDA
THOMAS M. DAVIS III, VIRGINIA
DAVID M. McINTOSH, INDIANA
MARK E. SOUDER, INDIANA
JOE SCARBOROUGH, FLORIDA
STEVEN C. LATOURETTE, OHIO
MARSHALL "MARK" SANFORD, SOUTH CAROLINA
BOB BARR, GEORGIA
DAN MILLER, FLORIDA
ASA HUTCHINSON, ARKANSAS
LEE TERRY, NEBRASKA
JUDY BIGGERT, ILLINOIS
GREG WALDEN, OREGON
DOUG OSE, CALIFORNIA
PAUL RYAN, WISCONSIN
JOHN T. DOOLITTLE, CALIFORNIA
HELEN CHENOWETH, IDAHO

ONE HUNDRED SIXTH CONGRESS

Congress of the United States

House of Representatives

COMMITTEE ON GOVERNMENT REFORM

2157 RAYBURN HOUSE OFFICE BUILDING

WASHINGTON, DC 20515–6143

MAJORITY (202) 225–5074
MINORITY (202) 225–5051
TTY (202) 225–6852

HENRY A. WAXMAN, CALIFORNIA,
RANKING MINORITY MEMBER
TOM LANTOS, CALIFORNIA
ROBERT E. WISE, JR., WEST VIRGINIA
MAJOR R. OWENS, NEW YORK
EDOLPHUS TOWNS, NEW YORK
PAUL E. KANJORSKI, PENNSYLVANIA
GARY A. CONDIT, CALIFORNIA
PATSY T. MINK, HAWAII
CAROLYN B. MALONEY, NEW YORK
ELEANOR HOLMES NORTON,
DISTRICT OF COLUMBIA
CHAKA FATTAH, PENNSYLVANIA
ELIJAH E. CUMMINGS, MARYLAND
DENNIS J. KUCINICH, OHIO
ROD R. BLAGOJEVICH, ILLINOIS
DANNY K. DAVIS, ILLINOIS
JOHN F. TIERNEY, MASSACHUSETTS
JIM TURNER, TEXAS
THOMAS H. ALLEN, MAINE
HAROLD E. FORD, JR., TENNESSEE

BERNARD SANDERS, VERMONT,
INDEPENDENT

"National Archives and Records Administration"

OPENING STATEMENT
REPRESENTATIVE STEPHEN HORN (R-CA)
Chairman, Subcommittee on Government Management, Information, and Technology
October 20, 1999

A quorum being present, this hearing of the Subcommittee on Government Management, Information, and Technology will come to order.

This is the Committee on Government Reform's first oversight hearing on the National Archives and Records Administration since the Honorable John Carlin became the nation's archivest in 1995. We welcome you today, Governor Carlin.

The National Archives and Records Administration is an independent Federal agency charged with preserving the nation's history through its oversight and management of Federal records. The agency has 33 facilities that hold about 21.5 million cubic feet of original texts, representing more than 4 billion pieces of paper generated by the executive, legislative, and judicial branches of the federal government.

One of the agency's essential responsibilities is to determine which government records should be preserved and which records may be destroyed. In accordance with the Federal Records Act, the National Archives assists other federal agencies in maintaining and disposing of the documents they generate. The job has become more complicated by the government's increasing use of electronic communication. The National Archives is in the process of assessing how agencies should preserve these electronic records for future generations.

Because of the increased volume in electronic communication, the National Archives is attempting to streamline its paper-based process under an 18-month Business Process Re-engineering plan to revise agency guidelines for records schedules. In addition, the National Archives plans to conduct a governmentwide survey to collect information on federal agencies' electronic records management programs. The agency has postponed this survey, however, until its Business Process Reengineering plan is completed.

In a recent report, however, the General Accounting Office found that management of electronic records varies widely among Federal agencies and departments. Because of this disparity, the GAO recommended moving ahead with the baseline survey. The Business Process Reengineering plan would be enhanced by the survey's results, which could include recommendations for best practices and guidance gleaned from the survey results, according to the GAO. The subcommittee will examine this issue today.

Since President Clinton's 1995 order to declassify historic documents that are 25 years or older, the federal government has processed 593 million pages for declassification. In the fiscal year 2000 Defense Authorization Bill, Congress added a provision that appears to require an additional review of all 593 million pages previously processed for declassification. There has been a great deal of confusion over the language of this provision. The subcommittee will examine how the National Archives, as a key player, will help implement this process and meet current declassification deadlines.

A third subject of today's hearing involves a revolving fund for the National Archives that was established by the Appropriations Committee's Subcommittee on Treasury, Postal Service, and General Government in fiscal year 2000 legislation. The fund sets up a mechanism for Federal departments and agencies to reimburse the National Archives for the expenses it incurs for storage of temporary records. There is a concern that mandating agencies to pay for this service would encourage them to withhold, or purge, documents that would otherwise be forwarded to National Archives.

We welcome our witnesses today and look forward to their testimony. I now yield to the subcommittee's Ranking Member, Mr. James Turner of Texas, for a statement.

Mr. HORN. As panel one, we have Governor John Carlin, Archivist of the United States, National Archives and Records Administration, who is accompanied by Mr. Lewis Bellardo, Deputy Archivist and Chief of Staff, and Ms. Adrienne C. Thomas, Assistant Archivist for Administrative Services.

I think you both know the routine here. We swear in all witnesses. Please stand and raise your right hands. If there are any staff behind you that will be giving you suggestions, please have them stand, too.

[Witnesses sworn.]

Mr. HORN. The clerk will note that the three witnesses and one staff member affirmed the oath.

Governor, we are delighted to have you here. Please take any time you want, but we would obviously like you to summarize your fine statement.

I might add that the statements automatically go in the record when we call on each witness. You do not have to read it, but we would like to have you summarize it. Then we can spend more time on dialog.

STATEMENT OF JOHN CARLIN, ARCHIVIST OF THE U.S. NATIONAL ARCHIVES AND RECORDS ADMINISTRATION, ACCOMPANIED BY, LEWIS J. BELLARDO, DEPUTY ARCHIVIST AND CHIEF OF STAFF; AND ADRIENNE C. THOMAS, ASSISTANT ARCHIVIST FOR ADMINISTRATIVE SERVICES

Mr. CARLIN. Mr. Chairman and staff, I am John Carlin, Archivist of the United States.

As the Chair has pointed out, I administer the National Archives and Records Administration. We are certainly grateful for this opportunity and welcome the chance to work with this very important oversight committee. I thank you for placing my full text in the record. I will summarize. I would like to touch on some of the things that might be of particular interest to you and then of course answer questions.

Because our strategic plan puts our customers first in our thinking, I want to first make it clear who they are and what we provide them.

Our mission, as defined in our strategic plan, is to ensure ready access to essential evidence documenting the rights and entitlements of citizens, the actions for which Federal officials are responsible, and the national experience. As you stated, we have 34 facilities across the country. They include regional archives, records services centers, and 10 Presidential libraries, where we preserve and provide access to literally millions of records—billions if you count individual pages, photographs, and recordings—ranging from our 18th century records to 100,000 late–20th century electronic files.

Literally thousands of people, including genealogists, lawyers, historians, veterans, newspaper and television journalists, and government employees, annually do research in our archival facilities, and thousands of others write or call with inquiries for records or information from our records. Approximately 1 million people, many of whom are school children, annually view the Charters of Freedom in our Washington rotunda, and each year approximately

1.4 million people view exhibits in our Presidential libraries. Approximately 1.5 million veterans annually request documentation from us of their entitlement to benefits.

People throughout the country this past year made more than 7 million user visits to our webpages. And the number of documents that researchers have pulled up to review from electronic editions of the Federal Register, the Code of Federal Regulations, and related publications that NARA produces now exceeds 100 million annually. In addition, as you know, Mr. Chairman, many historians, archivists, and records managers across the country are carrying out projects to preserve and publish records with the help of grants from the National Historical Publications and Records Administration, which is part of NARA.

I am pleased to say that increased support from the Congress and the administration for special initiatives over the past 3 years is enabling us to serve these customers better. As a political scientist, Mr. Chairman, you will be glad to know that scholars, among other researchers, are grateful to the Congress for making it possible, in the budget just passed for fiscal year 2000, for us to hire more archivists to assist them in our research rooms, and to provide better research room equipment for their use.

Researchers are grateful to Congress for enabling us to continue our progress in building an Archival Research Catalog that eventually will provide on-line descriptions of everything in our holdings so that their research can start at home. And researchers, especially genealogists, are also grateful for funds appropriated in our fiscal year 2000 budget to enable us to prepare for opening the 1930 census records.

Providing public access to records, however, is only half our job. We are the National Archives and Records Administration. We provide guidance to our largest customer, the three branches of Government, including the Federal courts and more than 300 Federal agencies with thousands of locations nationwide and around the world, on documenting their activities and managing their records. We also have the responsibility to approve how long Federal records are kept in order to protect individual rights, hold Government accountable, and document the national experience. For the Congress and its legislative agencies, we preserve official records in our Center for Legislative Archives and provide access to them.

Mr. Chairman, I do not have to tell an oversight committee how important it is for Government agencies to be able to locate and provide access to records quickly and adequately. When they have difficulty doing so, as in some recent cases, congressional committees feel frustrated by what, to us, is a records management problem. There have been a lot of charges and counter-charges about records availability, but I think it is true to say that the Congress, the executive branch, and NARA itself have not in the past put enough emphasis on the need for effective records management in the Government.

But fortunately that is changing, and we are grateful for the support that the Congress and the administration have been giving us in recent budgets for records management improvement.

With that introduction to what we do and for whom, Mr. Chairman, I would like now to turn to some specific concerns that may be of particular interest to you and your committee.

As you know, we are all concerned about electronic records. They pose an unprecedented challenge because such records are vulnerable to erasure, media instability, and technological obsolescence, and because they are mushrooming in quantity and in multiple formats. But we are making progress toward meeting these challenges and averting loss.

The magnitude of the problem has made us realize that NARA does not have, nor will we have, the expertise or the resources to meet these challenges on our own. Consistent with our strategic plan, we have made partnering with others our key strategy, so that our limited resources can be leveraged for maximum return.

For example, we have partnered with the Department of Defense to develop a set of baseline requirements for the management of electronic records, and we subsequently endorsed this baseline as a starting point for agencies that want to begin implementing electronic recordkeeping. Also, we have formed a partnership with Government records managers and information officers, and with private sector consultants, to launch an inter-agency Fast Track Guidance Development Project. This project will identify "best practices" currently available to Federal recordkeepers in managing electronic records.

In terms of electronic records preservation and access, we also have new hope, thanks to another partnership. Over the past quarter-century, NARA has taken into our archives approximately 100,000 files of electronic records from the U.S. Federal Government as a whole. But we estimate that the Treasury Department alone, for example, is now generating annually, in e-mail alone, nearly a million files of electronic records that we are likely to need to take into our archives.

So we entered into a partnership to support work at the San Diego Supercomputer Center on an automated system to enable us to take in large quantities of Government e-mail messages in a short time, and the Center has produced a prototype that is able to preserve 2 million e-mail messages in 2 days. This could be a huge breakthrough.

In the meantime, we continue to have volumes of paper records with which to deal through our records center operations for Federal agencies. We maintain a regional network of records centers in which we provide storage, retrieval, and other services on records that remain in the agencies' legal custody. With your support, Mr. Chairman—for which we are grateful—we instituted on October 1st a reimbursable program in which we offer agencies customer-oriented, fee-supported records center services.

For the first time, all agencies—not just some—will reimburse us for all records center services we provide. And as part of implementing this program, records storage standards were established, which will apply to both NARA and private sector or agency facilities.

We also continue to address needs of archival facilities that house the permanently valuable records in our own legal custody. Funds appropriated by the Congress are enabling us to search for

the kind and quantity of space we need to replace outmoded and full-up facilities in Anchorage, AK and Atlanta, GA. And we plan to renovate our grand old original archives building here in Washington—the building that houses, among other treasures, the records of Congress.

We'll upgrade its HVAC system to meet today's archival preservation standards, remedy shortcomings in electrical distribution and fire safety, meet requirements of the Americans with Disabilities Act, and improve public spaces generally. Here again, though, we are developing partnerships by soliciting private sector contributions to supplement public funds for educational aspects of the project.

The centerpiece of the renovation will be the replacement of currently deteriorating cases for the Nation's Charters of Freedom—the Declaration of Independence, the U.S. Constitution, and the Bill of Rights. They will receive state-of-the-art reencasement so that they may continue to be safely viewed in our rotunda by millions of visitors well into the new millennium.

On that happy note, I conclude my oral testimony. Again, I am grateful for support from you, Mr. Chairman, this committee, and the Congress. We have far to go to reach the goals in our strategic plan, but I am more encouraged today than at any time since I became the archivist. I am beginning to see real progress toward meeting the electronic era's great challenges in providing the services that the people of a democracy need to document their entitlements, hold their Government accountable, and understand our national historical experience.

Thank you very much.

[The prepared statement of Mr. Carlin follows:]

STATEMENT
by John W. Carlin
Archivist of the United States

to the
Subcommittee on Government Management, Information, and Technology
of the Committee on Government Reform
House of Representatives
Congress of the United States

20 October 1999

National Archives and Records Administration
8601 Adelphi Road, College Park, Maryland 20740
(301) 713-6410

Chairman Horn, members of the Subcommittee, and members of the Staff:

I am John Carlin, and as Archivist of the United States, I administer the National Archives and Records Administration. I'm grateful for your interest in NARA, and I welcome this opportunity to describe the challenges we face and the efforts we're making to meet them.

At the outset, I would like to touch on some things that might be of particular interest to you, and then provide a more detailed description of the full range of NARA's customers, services, concerns, initiatives, and progress. But because our Strategic Plan puts our customers first in our thinking, I want first to make clear who they are and what we provide them.

Our mission, as defined in our Strategic Plan, is to ensure ready access to essential evidence documenting the rights and entitlements of citizens, the actions for which Federal officials are responsible, and the national experience. In 34 facilities across the country, including regional archives, records services centers, and ten Presidential libraries, we preserve and provide access to literally millions of records—billions if you count individual pages, photographs, and recordings—ranging from our 18th-century Charters of Freedom to 100,000 late-20th-century electronic files.

Literally thousands of people, including genealogists, lawyers, historians, veterans, newspaper and television journalists, and government employees, annually do research in our archival facilities, and thousands of others write or call with inquiries for records or information from our records. Approximately one million people, many of whom are school children, annually view the Charters of Freedom in our Washington rotunda, and each year approximately 1.4 million people view exhibits in our Presidential libraries. Approximately 1.5 million veterans annually request documentation from us of their entitlement to benefits. People

throughout the country this past year made more than 7 million user visits to our web pages. And the number of documents that researchers have pulled up to review from electronic editions of the *Federal Register*, the *Code of Federal Regulations*, and related publications that NARA produces now exceeds 100 million annually. In addition, as you know, Mr. Chairman, many historians, archivists, and records managers across the country are carrying out projects to preserve and publish records with the help of grants from the National Historical Publications and Records Administration, which is part of NARA.

I am pleased to say that increased support from the Congress and the Administration for special initiatives over the past three years is enabling us to serve these customers better. As a political scientist, Mr. Chairman, you will be glad to know that scholars, among other researchers, are grateful to the Congress for making it possible, in the budget just passed for FY 2000, for us to hire more archivists to assist them in our research rooms, and to provide better research-room equipment for their use. Researchers are grateful to Congress for enabling us to continue our progress in building an Archival Research Catalog that eventually will provide on-line descriptions of everything in our holdings so that their research can start at home. And researchers, especially genealogists, are also grateful for funds appropriated in our FY 2000 budget to enable us to prepare for opening the 1930 Census records.

Providing public access to records, however, is only half our job. We're the National Archives—*and Records Administration*. We provide guidance to our largest customer, the three branches of the government, including the Federal courts and more than 300 Federal agencies with thousands of locations nationwide and around the world, on documenting their activities and managing their records. We also have the responsibility to approve how long Federal

records are kept in order to protect individual rights, hold government accountable, and document the national experience. For the Congress and its legislative agencies, we preserve official records in our Center for Legislative Archives and provide access to them.

Mr. Chairman, I do not have to tell an oversight committee how important it is for government agencies to be able to locate and provide access to records quickly and adequately. When they have difficulty doing so, as in some recent cases, Congressional committees feel frustrated by what, to us, is a records-management problem. There have been a lot of charges and counter-charges about records availability, but I think it is true to say that the Congress, the Executive Branch, and NARA itself have not in the past put enough emphasis on the need for effective records management in the government. But fortunately that is changing, and we're grateful for the support that the Congress and the Administration have been giving us in recent budgets for records-management improvement.

With that introduction to what we do and for whom, Mr. Chairman, I would like now to turn to some specific concerns that may be of particular interest to you and your committee.

As you know, we are all concerned about electronic records. They pose an unprecedented challenge because such records are vulnerable to erasure, media instability, and technological obsolescence, and because they are mushrooming in quantity and in multiple formats. But we are making progress toward meeting these challenges and averting loss.

The magnitude of the problem has made us realize that NARA does not have, nor will we have, the expertise or the resources to meet these challenges on our own. Consistent with our Strategic Plan, we have made partnering with others a key strategy, so that our limited resources can be leveraged for maximum return.

For example, we have partnered with the Department of Defense to develop a set of baseline requirements for the management of electronic records, and we subsequently endorsed this baseline as a starting point for agencies that want to begin implementing electronic recordkeeping. Also, we have formed a partnership with government records managers and information officers, and with private-sector consultants, to launch an inter-agency Fast Track Guidance Development Project. This project will identify "best practices" currently available to Federal record keepers in managing electronic records.

In terms of electronic-records preservation and access, we also have new hope, thanks to another partnership. Over the past quarter century, NARA has taken into our archives approximately 100,000 files of electronic records from the U.S. Federal Government as a whole. But we estimate that the Treasury Department alone, for example, is now generating annually, in e-mail alone, nearly a million files of electronic records that we are likely to need to take into our archives. So we entered into a partnership to support work at the San Diego Supercomputer Center on an automated system to enable us to take in large quantities of government e-mail messages in a short time, and the Center has produced a prototype that is able to preserve 2 million e-mail messages in two days. This could be a huge breakthrough.

In the meantime, we continue to have volumes of paper records with which to deal through our records-center operations for Federal agencies. We maintain a regional network of records centers in which we provide storage, retrieval, and other services on records that remain in the agencies' legal custody. With your support, Mr. Chairman, for which we are grateful, we instituted on October 1 a reimbursable program, in which we offer agencies customer-oriented, fee-supported records-center services. For the first time, all agencies, not just some, will

reimburse us for all records-center services we provide. And as part of implementing this program, records storage standards were established, which will apply to both NARA and private-sector or agency facilities.

We also continue to address needs of archival facilities that house the permanently valuable records in our own legal custody. Funds appropriated by the Congress are enabling us to search for the kind and quantity of space we need to replace outmoded and full-up facilities in Anchorage, Alaska, and Atlanta, Georgia. And we plan to renovate our grand old original archives building here in Washington—the building that houses, among other treasures, the records of Congress. We'll upgrade its HVAC system to meet today's archival preservation standards, remedy shortcomings in electrical distribution and fire safety, meet requirements of the Americans with Disabilities Act, and improve public spaces generally. Here again, though, we are developing partnerships by soliciting private-sector contributions to supplement public funds for educational aspects of the project.

The centerpiece of the renovation will be the replacement of currently deteriorating cases for the nation's Charters of Freedom—the Declaration of Independence, the U.S. Constitution, and the Bill of Rights. They'll receive state-of-the art re-encasement so that they may continue to be safely viewed in our rotunda by millions of visitors well into the new millennium.

With that introduction, I would now like to provide you with a more detailed description of the initiatives I have described and others that are critical for reaching goals in our Strategic Plan.

Our Strategic Plan identifies four major goals toward which we strive. If we are successful, the following four things will be achieved:

- *Essential evidence will be created, identified, appropriately scheduled, and managed for as long as needed.*
- *Essential evidence will be easy to access regardless of where it is or where users are for as long as needed.*
- *All records will be preserved in appropriate space for use as long as needed.*
- *NARA's capabilities for making the changes necessary to realize our vision will continuously expand.*

Success in the latter goal, will be reflected in our progress toward the first three, and success in those three requires that we improve front-end records management in the Federal Government, meet the special challenges posed by electronic records, expand public access to records in general, and meet storage and preservation needs of growing quantities of records. What progress on each of these fronts have we made?

Progress In Improving Records Management

Every day, White House officials, agency administrators, Congressional committees, and Federal courts create thousands of records. NARA helps them meet statutory requirements that they document activities, maintain records systematically, and determine which ones have sufficient historical or other value to warrant continued maintenance, and for how long. Without effective records management, records needed to document citizens' rights, actions for which Federal officials are responsible, and the historical experience of our nation will be at risk of loss, deterioration, and destruction. With more than 300 agencies creating records in thousands of locations, NARA has had difficulty responding even reactively to demands for records

management assistance and service, and reactive responses do not guarantee that all important government records are safe. To ensure that records are not in jeopardy—that "essential evidence will be created, identified, appropriately scheduled, and managed for as long as needed"—NARA's strategic plan calls for aggressive promotion of effective front-end records management throughout the government.

We accelerated our records-management activities in FY 1998 through efforts to secure high-level support in Federal agencies for records management; to develop more records-management assistance to field offices as well as Washington offices of Federal agencies; and to begin planning a review and reinvention of how Federal records are identified, appraised, scheduled, and tracked while in agency custody. We are proceeding with our records scheduling study and have launched a major records-management initiative—our "Targeted Assistance Program" for providing assistance to Federal agencies nationwide with urgent records-management needs.

NARA's Targeted Assistance Program: With funds appropriated in FY 1999, we have added to our records management staff 13 positions, which we have filled with persons experienced in all records media, including electronic records. In addition to working with agencies' headquarters in Washington, these professionals have been deployed in FY 1999 to help agencies' field offices in Boston, Seattle, and Fort Worth. We are receiving grateful feedback from agencies that for years have not had this kind of assistance. And agencies with particularly severe or urgent records management needs are getting priority help from us.

We are going forward with our nationwide Targeted Assistance Program to assist agencies with their critical records management needs. FY 2000 appropriations provide 17

additional staff positions for expanding assistance into more of our regions as well as to more agency offices in Washington. In the future we will need to expand records-management assistance further so that every NARA region will have a Targeted Assistance Program.

Our additional employees will help Federal agencies manage Government records in all formats in accordance with NARA recordkeeping requirements.

NARA's Records Scheduling Reinvention Effort: We also have launched a preliminary study of the ways records disposition decisions are made throughout the Federal Government in the electronic-information era. The responsibility for approving the disposition of records is the most critical statutory responsibility I hold as Archivist of the United States because it determines how long records must be kept to protect individual rights, provide accountability in government, and document the national experience. Therefore, the scheduling and appraisal process used to carry out this responsibility is central to NARA's mission.

The scheduling policies and processes developed during the 20th century and currently used by the Federal government apply primarily to paper-based recordkeeping systems. But the reality at the end of the 20th century is that most records are created electronically and may be maintained in a variety of media. We must explore what should be the Federal Government's policies in the 21st century on determining the disposition of records, the processes that will best implement those policies, and the tools needed to support the revised policies and processes. Working with various stakeholder groups, we will answer a number of basic questions about Federal documentation, the goals and purposes of scheduling, the appraisal criteria to be used in determining appropriate retentions, and the respective roles of NARA, Federal agencies, and the public in determining dispositions.

These are major steps in our effort to achieve the first goal in our Strategic Plan: *Essential evidence will be created, identified, appropriately scheduled, and managed for as long as needed.*

Progress in Meeting Electronic Records Challenges

As I indicated earlier, special efforts are needed to manage, preserve, and provide access to electronic records. The massive explosion both in quantities and types of electronic records generated in the Federal Government only continues to accelerate. New technological ways to create records have not been matched by technological advancements to manage them. The Government must address realistically a future in which most government recordkeeping will be electronic, and unless we successfully address the key issues, essential evidence will be lost. To ensure the survival of such evidence, we need to meet four critical challenges:

- *NARA needs to develop and update guidance for Federal agencies to help them manage an increasing variety of electronic records.* Expanding technology has outstripped NARA's capacity to develop even basic guidance for many major types of electronic records, such as document management systems and electronic commerce. Without such guidance it is not realistic to expect Federal agencies to develop electronic recordkeeping systems that will protect records that preserve individual rights or hold government accountable, much less allow NARA the opportunity to provide long-term preservation and access.
- *NARA needs to work with partners to identify technological solutions that*

agencies and NARA can apply to distinguish between permanent and temporary electronic records without human intervention. One of the early lessons from agencies trying to implement electronic recordkeeping for e-mail is that staff find it burdensome to distinguish between temporary and permanent records when the volume agencies deal with is now in the millions.

- *NARA needs to develop capabilities to preserve permanently the increasing volume and variety of electronic records created by agencies.* NARA must develop the capacity to preserve electronic records even when the hardware and software that were used to produce them are obsolete and no longer function. NARA's current capability for accessioning and preserving electronic records continues to be limited to databases and simple forms of electronic textual records. We must be able to accession and preserve the many other common classes of electronic records, such as word-processing files, document images, spreadsheets, digital photography, video and sound recordings, and geographic information systems.
- *NARA must develop capabilities to provide permanent access to electronic records so that researchers can discover and retrieve what they need.* Preserving electronic records alone is not enough. Users must be able to access them once they have been preserved. By statute, NARA is the Federal agency required to provide permanent access to records, including

electronic records. Providing access to electronic records is currently limited largely to producing one-to-one copies of entire data sets on digital media and, to a very limited extent, formatted printouts of data. On-line access is limited to a few databases of war-time casualty data or to records NARA has digitized from paper or other formats. Providing access that meets user needs—namely, electronic access—to records created electronically in Federal agencies is a challenge we must meet.

In FY 1998 we created an inter-agency Electronic Records Work Group to consider alternatives to electronic-records guidance in General Records Schedule 20, which a Federal district court ruled null and void. Though that ruling has been reversed on appeal, we have acted nonetheless on the Work Group's recommendations, and thanks again to support from the Administration and the Congress in the FY 1999 budget, we have taken other steps to deal with electronic records needs:

- We issued guidance to Federal agencies on how to schedule electronic copies of program records that remain on an e-mail or word-processing system after a record-keeping copy has been produced.
- We developed changes to general records schedules that authorize the disposal of certain administrative records, regardless of physical format.
- We developed a new general records schedule for administrative records documenting the management of information technology, which has had two rounds of review by Federal agencies and, after revision, will be published in the *Federal Register* for public comment.

- We launched an inter-agency "Fast Track Guidance Development Project" to identify "best practices" currently available and to provide guidance quickly on electronic-records issues that urgently confront Federal record keepers now—guidance they can use while work goes forward on developing more complete and longer-term solutions.
- We have partnered with the Department of Defense, as I said in my overview, to develop a set of baseline requirements for the management of electronic records, and we subsequently endorsed this baseline as a starting point for agencies that want to begin implementing electronic recordkeeping. This standard does not answer all pertinent questions nor preclude other approaches, but does provide at least a starting point for agencies that want to begin implementing electronic recordkeeping now.
- We are reviewing DoD's certification process for software meeting baseline electronic records management requirements, and we are working with DoD and other Federal agencies on other technical projects of potential value to government agencies in dealing with electronic records. Funds appropriated for FY 2000 will enable us to continue this work, which we expect to lead to records-management applications of use throughout the government.

Moreover, as I indicated in my overview, we *may*—and "may" must be emphasized because we are still in the research-and-development stage—have in sight a workable way to maintain electronic records in a comprehensive system providing both preservation and access

for all data types without dependence on particular software or hardware. Let me elaborate on the overview of this development that I gave before.

For some time now, NARA has been able to accession electronic databases. But the Government is increasingly generating large numbers of electronic records, such as e-mail messages, word-processing documents, and spread sheets, which are treated electronically as individual files. NARA has had no method of preserving and making these millions of files available. In our search for an answer, we joined the National Partnership for Advanced Computational Infrastructure to seek a solution. At this stage, a prototype system has been developed by our partners at the San Diego Supercomputer Center, a national laboratory for computational science and engineering at the University of California, San Diego. The prototype has been able to preserve a million e-mail messages in just two days.

Additionally, research being done for us at the Supercomputer Center and at the Army Research Laboratory gives us hope that an Electronic Records Archives can be built to preserve any kind of electronic record, in a format that frees it from the computer system in which it was created, and will enable us to meet requests for it using a variety of tools available today and advanced technologies that will be developed for tomorrow. Moreover, access will be expedited by combining this system with the Archival Research Catalog we are developing to describe all bodies of records in our nationwide holdings. All this could be a major breakthrough in our search for an affordable system to accession, preserve, and provide electronic access to electronic records of the Federal Government.

In FY 2000, NARA will be working to take these next steps:

- We will build in the following ways on the initial work done on three key

projects described above: the DoD standard needs more evaluation and testing; the Fast Track Guidance Development Project needs to answer some key questions; and the Electronic Records Archives partnership project needs to take steps beyond the initial prototype for accessioning, preserving, and providing access to electronic records.

- We will build our capability to preserve document image files. Currently the imaging industry does not have agreed-upon standards that will allow interchange of documents among systems or transfer to and preservation by NARA. Because many of the records that agencies are currently imaging have been archival in paper forms, NARA must work with agencies to develop standards for imaging permanently valuable records so they can be permanently preserved, or risk losing a generation of historically valuable documentation. In FY 2000 we will undertake the development and testing of imaging standards and techniques to ensure long-term preservation and access to the government's permanent records.
- We will build our current capacity to process the increasing volume of records: Additional positions we are adding in FY 2000 for electronic records work will enable us to take into NARA the increased flow of electronic records that can't wait for the future system being developed. This staff will handle the work generated by the increased scheduling, appraisal, and oversight efforts growing from our targeted assistance to agencies.

Beyond FY 2000, we will need to expand and build upon current efforts in the following

ways:

- Add high-level professionals to oversee the development and implementation of the Electronic Records Archive. We must be much stronger internally if we are to succeed in building on progress we are making with our partners in learning how to preserve and provide access to electronic records of many kinds in large quantities. Not only must we find the solutions but we must be able to implement them.
- Expand our efforts to develop guidance and technical solutions for agencies for managing electronic records by using NARA itself to test guidance we will give to agencies. We can provide records management guidance and advice most effectively and authoritatively if we use our own agency as a test bed, making NARA itself a model for others of affordable, workable records-management practices. Advice we offer other agencies will have no credibility unless we use it with our own records. The first step in doing that will be our launching of a business-process improvement project (BPI) to renovate NARA's own records-management system and methods for the era of electronic records. A major part of this work will be to document the study itself, and such products and improvements as come out of it, for the benefit of other agencies. Moreover, implementing the recommendations will go hand in hand with evaluating recordkeeping system software that we expect to test in FY 2000 in hope of coming up with a records management application (RMA) that we can use agency-

wide, and that may also prove useful to others. It only makes good common sense that NARA test within itself solutions we can share as we work with agencies on preserving and providing access to essential evidence.

Clearly, there still remain many obstacles to coping successfully with electronic records. We must continue to leverage our resources through productive partnerships, build working relationships with Federal agencies, and—maximizing the opportunity given us by Administration and Congressional support—build NARA's internal capacity to get the job done. Because records in the future will be increasingly electronic, taking the steps I have described for managing, preserving, and providing access to them will be critical for meeting *all* of the major goals in NARA's Strategic Plan.

Progress in Expanding Opportunities For Access

With Congressional support going back to FY 1994, we are increasing access to records in many areas. Here are some highlights:

- Genealogists, historians, and other researchers can locate microfilmed records they need from an on-line microfilm publications database we completed in FY 1999, describing more than 3,000 microfilm publications and identifying where they can be found in NARA facilities.
- Participants in the current international effort to trace gold, artwork, and other assets looted by the Nazis from Holocaust victims now can use a major NARA publication, produced in FY 1999, describing the large body of relevant records in our holdings. NARA chairs the Interagency Working Group on Nazi War Criminals Records, created by Executive Order to help

implement the Nazi War Crimes Disclosure Act.

- Persons who want facts with which to evaluate theories about the assassination of President Kennedy may now search some 2,000 cubic feet of relevant records in NARA's JFK Assassination Records Collection, to which we continued adding material in FY 1999, at the beginning of which NARA took over sole responsibility for the collection from the statutorily terminated JFK Assassination Records Review Board.

- Users of our *Federal Register* publications are finding additional material on line. Along with the daily *FR* itself and the entire *Code of Federal Regulations*, we put on-line in FY 1999 the listing of Executive Orders and their codification; we created a process to help users of the *CFR* determine which sections have been updated; and we are preparing the public papers of the Presidents for on-line access, with photographs as well as texts.

In addition, we are making progress on the following access projects:

- building our electronic Archival Research Catalogue
- meeting records-declassification requirements
- developing our web site
- improving our data administration, and
- upgrading NARANET, our electronic communications network

I will explain each of these one by one below.

Building an electronic Archival Research Catalogue: As part of the Electronic Access Project I mentioned earlier, we are building an Internet-accessible catalog of NARA's nationwide holdings. People who want to do research in our collections can begin at home or school and search more than 400,000 descriptions of our records through the NARA Archival Information

Locator, which is a prototype for our Archival Research Catalog. We plan to complete the catalog structure in the summer of 2000, and we will begin conversion of data to reach our goal to describe 100 percent of our archival holdings in a nationwide catalog by 2007. Additionally, teachers, students, and the general public can now download, via the Internet, 124,000 images of significant and high-interest documents, photos, and other NARA records that we completed digitizing in FY 1999 from our nationwide holdings as part of our Electronic Access Project. FY 2000 appropriations will enable us to roll out our Archival Research Catalog system to our facilities nationwide and begin the conversion of records data from outdated, incomplete systems and paper finding aids to our Internet accessible catalog.

Meeting declassification requirements. Many kinds of researchers will benefit from access to more than 10 million pages of records that we declassified so far in FY 1999, bringing to nearly 330 million the number of pages of records that NARA has now declassified under the Administration's Executive Order—the largest number of records declassified by any one agency and more than half of the total declassified throughout the Federal Government.

Nonetheless, more work will be needed to meet the requirements of Executive Order 12958 by reviewing and declassifying (or exempting from declassification) all permanently valuable records more than 25 years old. Despite having made major progress toward reducing the backlog of records requiring review, we need resources to complete the new, Congressionally mandated reviews of records in our holdings. The Kyl Amendment, the Lott Amendment, and other special declassification projects require re-reviews of already declassified records and page-by-page review and interagency referrals (in the Nazi War Crimes and Chile/Pinochet projects, for example), which greatly slow the pace of declassification.

I would like to add here that NARA's responsibilities include administration of the Information Security Oversight Office (ISOO), which has functions under Executive Orders on classified national security information and the National Industrial Security Program. ISOO directs oversight of declassification programs within agencies through on-site program reviews to improve the quality and output of these programs. ISOO also conducts reviews of classification programs and special access programs within agencies, while strengthening data collections and analysis, working with NARA on a database of information that has been declassified, and maintaining support for the Interagency Security Classification Appeals Panel (ISCAP) and the Information Security Policy Advisory Council (ISPAC).

Developing our web site. In 1996, we recognized that web technology would be a key strategy to employ to fulfill our mission. We must make full use of the web and ensure that the information and services our web site provides meet the needs of Federal agencies and citizens. Since NARA's web site was launched in 1996, it has grown tremendously. But the web site has been primarily staffed by employees who have other full-time jobs. We need now to professionalize our web staff and upgrade our web tools.

Improving data administration. Because NARA provides to agencies and the public information about our holdings and records themselves that document individual rights, the actions of Federal officials, and the national experience, it is critical that the information we provide is reliable, accurate, complete, consistent, and timely. Users must have confidence in our determinations about whether we have the records they need. Although we have had a data standards program in place, it has never been adequately staffed to serve as a comprehensive program for managing the data used in our daily operations and in fulfilling reporting

requirements. Without a strong agency-wide program, we are in danger of building systems that will not be able to exchange data or even use the same data for different purposes. Our Strategic Plan calls for us to implement policies and standards that facilitate development of an integrated, agency-wide information infrastructure. Building on the data standards efforts we began in our Electronic Access Project, we are adding three new staff positions with funding now available. In future we will also need contractor support for our data administration program in order to:

- improve data quality and reliability,
- increase data sharing, and
- control data redundancy.

Finish upgrading NARANET, our electronic communications network. NARANET now enables citizens who cannot visit our sites to do research and request needed information; it allows Federal agencies quick access to records-management information and help; it allows citizens, such as veterans, access to information to document their rights; it allows researchers visiting one of our locations to find related information at our other locations; and it allows staff nationwide to communicate efficiently to meet customer needs. Within the next several years, NARANET will need to support our initiatives to accept electronic records from the agencies that create them and preserve and provide access to them. NARANET also will need to support a system we are planning to facilitate records scheduling with agencies, including allowing schedules to be submitted electronically by agencies. We plan to build a reliable, expandable, high-capacity, cost-efficient information technology and communications infrastructure to support our work processes and public access to our holdings.

NARA's ability to perform its mission depends on the sustainability of this internal

network backbone. We must reach our performance target of maintaining a 95-percent effective computer and communications infrastructure by 2007. In 1998, NARANET was 76 percent effective overall. In FY 1999, we installed monitoring tools and developed processes for measuring network performance, renovated 17 mission critical systems for Y2K compliance, kept network running a high percentage of the desired time, and began the cyclical replacement of workstations, network operating systems, software upgrades, and network servers, routers, and supporting software. In FY 2000 we will increase the speed at which our network delivers services, renovate 100 percent of mission critical systems for Y2K compliance, and complete the first cyclical replacement of hardware and software begun in FY 1999. Next steps must include these:

- replace 20 to 30 percent of NARANET components annually and support a 15-percent annual growth rate,
- carry out necessary staff IT training,
- create a national help desk for staff,
- expand contractor maintenance support in our Presidential libraries and regional archival facilities,
- develop the user-support services necessary to meet long-range performance targets in our Strategic Plan, and
- increase overall network performance.

Improve services to veterans. NARA employees in team-based pilot projects have been conducting tests of new processes designed to improve services to veterans who request records to document entitlements to benefits. As I noted earlier, our National Personnel Records Center

in St. Louis receives approximately 1.5 million requests each year from veterans and their representatives for documentation of their military service. Veterans and their families need accurate, complete, and prompt information from military personnel records in order to obtain their rights and benefits, which may include health care, home loan guarantees, education, employment, and burial allowances. However, in past years, backlogs of unanswered requests have ranged from 30,000 to 140,000. The result has been lengthy delays in getting veterans and the Veterans Administration the documents they need.

To remedy this service deficiency, we launched a business-process re-engineering study in FY 1997. From this study we developed a plan for a radical reinvention of the Center's reference processes. During FY 1999, we tested the redesigned processes through team-based pilot projects. And our FY 2000 budget provides for human-resource initiatives and information technologies needed to implement the plan. Beyond this, we will continue implementation by testing customer-service innovations, training staff further to work in a new team system, and acquiring additional information technology and telecommunications infrastructure to support service improvement. This will result in greatly reducing the backlog of requests and ensuring routinely prompt service to America's veterans.

All of these access improvements will help us achieve the second major goal in our Strategic Plan: *Essential evidence will be easy to access regardless of where it is or where users are for as long as needed.*

Progress In Meeting Storage and Preservation Needs Of Growing Quantities of Records

We also have made progress toward meeting our third major goal: *all records will be*

preserved in appropriate space for use for as long as needed. To ensure that Federal agencies' records are protected wherever they may be stored, in our facilities or those of others, we drafted records-center facilities standards, which we have revised based on extensive comment and have published in the *Federal Register*. Additionally, we have made further progress on preserving records in jeopardy.

With money appropriated by the Congress for the preservation of at-risk archival holdings, in FY 1999 we preserved 185 cubic feet of new records we received that required preservation action, and we preserved 1,320 cubic feet of previously identified at-risk records. In addition, we instituted risk assessment procedures for all new accessions of Federal records in the Washington, D.C., area; trained Presidential library archivists in preservation and risk-assessment procedures; and surveyed records proposed for laboratory conservation treatment in six regional archives facilities. Also, we conducted meetings at our facilities across the country to get advice from our customers for a plan to deal with our overall space needs.

Additionally, with your support, Mr. Chairman, we developed the program I mentioned earlier under which Federal agencies now reimburse NARA fully, through a revolving fund, for the costs of storage and services they receive from our records centers. On October 1, after working to help Federal agencies prepare for the change, we launched our reimbursable program, which will improve government efficiency by enabling us to provide as much space and service as agencies really need while giving them a financial incentive to evaluate those needs carefully. In preparation, we analyzed our finances so that our prices cover all records-center costs. We developed policies and procedures for records-center accounting and billing. We worked on the technological infrastructure for our interim billing system while we develop the requirements for

a new accounting and billing system. And to meet our customer-service standards, we added staff to be paid from records-center revenue. With the approval of this subcommittee, the Congress has enabled us to capitalize our records-center revolving fund to start the program. And we will make continuing improvements as our staff gains experience and we upgrade technology for the program.

We will provide quarterly reports on the program as requested by you, Mr. Chairman, and work with the Committee staff to see that the reports are in a form that is helpful for the Committee's review. NARA will benefit from this program because expanding space costs were eating up increasing proportions of our overall budget. Now agencies will pay for additional space they need—and will be able to get all they request because the amount of space will no longer be limited by our budget. Also, we'll be able to devote resources previously tied up in space costs to helping agencies manage records more efficiently and schedule them more carefully, all of which could save money for the agencies individually and for the government as a whole.

Establish a new regional archives in Alaska. Our regional records-services facility in Anchorage, Alaska, is located in an annex to the Anchorage Federal Building. We do not have enough space there for all archival records we should be accessioning from the many Federal agencies operating in that state. For FY 1999, Congress appropriated funds for NARA to conduct a requirements study and begin the design of a facility solution in Anchorage. Funds appropriated for FY 2000 will allow us to complete site selection, conduct an environmental impact study, and complete the design for a new facility. Then we will need to contract for the construction of the new facility and for construction-quality management. Efficiency and

economy in government records storage in Alaska depend upon larger, more appropriate facilities there.

Find new space for archival operations in our Southeast Region. A study of space needs in our regional facilities nationwide indicates that our Southeast regional operation in the Atlanta area also has particularly pressing needs, both for adequate and for appropriate space. Our regional archives and our regional records center have been located in a World War II "temporary" warehouse in East Point, Georgia. GSA has agreed with us that renovating the existing building to meet our needs is not financially feasible. Accordingly, we are moving the records center part of our operation to a GSA-controlled space in a more modern Federal Supply Warehouse in nearby Palmetto, Georgia. Thus GSA will have a Federal tenant for otherwise vacant space, and we will have much improved space with expansion room at low overall cost to the government.

Ensure the survival of veterans' records in jeopardy. Earlier, we described our need for funds for a reinvention of our processes for meeting requests of veterans for information from their military service personnel files. Reference service also will require preservation of military service records, many of which are now at risk. Because of the great value of these records, to history as well as to individual veterans, they will be accessioned permanently into NARA's holdings. And because of their huge volume, these records will require a new facility with archival climate controls and security. But the poor condition of many of these records requires that we institute an immediate, comprehensive program for their preservation.

For example, we will reformat 14,400 reels of Air Force Flight Records from 1911–1974, and 1,393 reels of Veterans Administration Master Index Card Files for World Wars I and II. The

Air Force microfilm, which is the only source for many individual flight records, has developed spots, which, if unchecked, will destroy the readability of this valuable documentation. The film containing VA card files, which is heavily used, is losing image legibility. Thousands of cubic feet of paper records are in danger of crumbling away from the effects of deteriorating paper stock, the wear and tear of repeated handling, and damage from a 1973 fire.

FY 2000 appropriations are enabling us to set up a preservation program and plan for housing, reformatting, and providing special treatment for these documents. We will need to take these additional steps to carry forward records treatment in our veterans' records preservation program:

- perform holdings maintenance
- prepare materials for reformatting
- let contracts for reformatting, and
- purchase specialized supplies and equipment.

America's veterans must remain confident that records of their service will be available to them, their families, and historians in years to come.

Renovate the original National Archives Building in Washington. The original National Archives Building, an architectural landmark in downtown Washington, D.C., is now nearly two-thirds of a century old. Approximately one million people from across America and abroad visit it annually to do research and see the great American Charters of Freedom—the Declaration of Independence, the U.S. Constitution, and the Bill of Rights—in the magnificent rotunda that was designed for their protection and display. But to continue to accommodate large numbers of visitors and safely preserve the Charters and thousands of other historical treasures in the aging

building, its renovation has become essential. The rotunda itself must be renovated to accommodate the new encasements and vaults we are preparing for the future safety of the Charters of Freedom. The current HVAC system requires upgrading to meet archival standards for the continued preservation of our other holdings in the building. We must remedy significant shortcomings in electrical distribution and fire safety in the building, which otherwise will pose dangers for occupants as well as records. And current public-use space is inadequate for today's levels of visitors and researchers.

The Administration and the Congress gave us funds for work on a concept design for the renovation, for which we will prepare through FY 2000. The next step will be to contract for the renovation construction, which we anticipate completing in FY 2003. When finished, the renovation will:

- correct the mechanical, electrical, and fire safety deficiencies that post a danger to the building and the occupants
- retrofit the Rotunda area so that the Charters can be displayed in their new encasements
- bring the building, the documents, and the displays into full compliance with requirements of the Americans with Disabilities Act, permitting all Americans to view the Charters of Freedom and use the research rooms
- upgrade stack storage conditions to meet modern archival standards for textual records by adding chemical filtration of the air and tighter temperature and humidity controls, and
- provide sufficient exhibit and public-use space to accommodate increasing

numbers of visitors.

As I mentioned earlier, we are asking private-sector donors to partner with us in developing public-education elements of the renovation, including creation of an exhibit such as we've never had before, that will help visitors understand the historical meaning of the Charters of Freedom they come to see.

That concludes my description of NARA's current program needs and initiatives. Everything I have described will enable us to reach the targets and advance toward the goals projected in our Strategic Plan. And they will pay off for the government and the public in specifically significant ways:

- Federal agencies will be able to keep better track of their records, meeting requests for them from the public, courts, and the Congress more efficiently and economically
- historians, other scholars, and the public will have greater assurance that burgeoning quantities of valuable records—electronic as well as traditional kinds—will not be lost, and
- Americans everywhere will have far easier access to records they need for documenting rights and entitlements, understanding government actions, and learning about our history.

Let me conclude with notes on three other activities that are also of concern to the subcommittee: our grant making through the National Historical Publications and Records Commission (NHPRC), our Y2K preparations, and our ability to comply with GPRA reporting requirements.

NHPRC grants: NARA administers the NHPRC, whose statutory mission is to ensure understanding of our nation's past by promoting, nationwide, the identification, preservation, and dissemination of essential historical documentation. NARA safeguards *Federal* records; NHPRC helps *non*-Federal institutions identify, preserve, and make broadly accessible other records of historical value through grants to non-profit bodies such as archival institutions, records programs, and documentary publication projects.

For example, with NHPRC assistance, historians are locating, editing, and publishing the papers of Thomas Jefferson and other founding fathers, papers that document other leading figures in our history (e.g., Thomas Edison, Susan B. Anthony, Martin Luther King, Jr.), and, papers that document the Ratification of the Constitution, the early Supreme Court, and the First Federal Congress. Also, NHPRC is providing leadership by funding research-and-development projects to help meet electronic records challenges. Grants of this kind include funds to enable a non-Federal expert team from the U.S. to participate in the InterPARES project, which is an international research initiative. And NHPRC has contributed significantly over many years to the advancement of knowledge and training in the fields of archives, records management, and documentary editing. Additionally, NHPRC grants are helping State Historical Records Advisory Boards in every state and U.S. territory to survey their documentary resources and needs, set priorities, and make plans for the most effective use of each state's documentary resources. In several states, legislatures have appropriated funds in partnership with NHPRC to provide regrants for state and local projects that implement state plans.

These state collaborative programs help NHPRC make its own funds go further, reach grass-roots records programs, and do it economically. The state programs also help NARA in

our effort to document Federal programs, the understanding of which depends on recordkeeping by states and localities where so many Federal programs actually are implemented. Thus NARA and NHPRC work together to carry out our complimentary missions nationwide.

Y2K preparations: We continue to progress toward our goal of ensuring that no material impact on important business operations results from Year 2000 date-related failures. We are providing monthly progress status reports to OMB, and 21 of NARA's 22 mission-critical systems are now compliant. We plan to complete all upgrades by October 22, 1999.

Specifically, at all NARA facilities, we have brought all infrastructure into compliance, completing upgrades to building-environmental and security control systems, telephone systems, and the entire NARANET wide-area computer network. NARA systems supporting Federal agency records-management programs have been renovated for Y2K compliance and we are currently completing tests of them. The holdings-management systems at the Bush and Ford Presidential Libraries have been renovated for Y2K compliance, as well as the JFK Assassination Records Collection system that facilitates collection and use of assassination related records. The Government Printing Office has provided written certification that the systems and data associated with our *Federal Register* publications and operations are Y2K compliant. All mission-critical systems will complete the NARA Y2K certification approval process, which validates that essential system renovations have been performed, independent Y2K testing has been conducted, and appropriate contingency plans have been developed. We have a Business Continuity and Contingency Plan for our mission-critical systems, and as part of that plan, we are now completing work on a "Day One" strategy to ensure that all business functions continue effectively beyond January 1, 2000.

GPRA compliance. We also have developed and deployed a Performance Measurement and Reporting System. The Government Performance and Results Act requires that we tell the Administration, the Congress, and the American people how well we are doing against our strategic goals with data that is consistent, reliable, and auditable. Our new system is a data warehouse that collects performance data from other databases, verifies that the data is "clean," and stores it in a central place for reporting purposes. The interface to the system is a web-based on-line analytical processing tool that allows us to view the performance data against our annual plan targets in a variety of dimensions including across time (yearly, quarterly, monthly, etc.) and across organizational components. For the first time we have reliable performance data that we can analyze and use to show results and improve our services. During the next year we plan to integrate and expand the system so that our performance is measured using a balanced scorecard approach for tracking cycle times, quality, productivity, cost, and customer satisfaction for our products and services.

To sum up, on all fronts—records management, electronic records, access, storage, preservation, Y2K compliance, and NHPRC grant making—we are fulfilling the promises on the basis of which the Administration and the Congress have provided significant funding increases over the past three years. We have laid a solid groundwork for badly needed advances called for in our Strategic Plan. We are still far from where we need to be in coping with the many challenges I have described. But with continued support from the Congress, we will get out of the catch-up mode and provide the quality service that the American public requires.

Again, I'm grateful for support we have had from you, Mr. Chairman, this committee, and the Congress. We have far to go to reach the goals in our Strategic Plan, but I am more

encouraged today than any time since I became Archivist. I'm beginning to see real progress toward meeting the electronic-era's great challenges and providing the services that the people of a democracy need to document their entitlements, hold their government accountable, and understand their national historical experience. Thank you very much.

Mr. HORN. We thank you, Mr. Carlin.

Do either of your other staff members wish to add anything to that?

Mr. CARLIN. Not at this point.

Mr. HORN. Let me turn first to our ranking member on the subcommittee, a very hard-working member from Texas, Mr. Turner. I am going to start the questioning with him. We are going to alternate between him and myself and anyone else that shows up 5 minutes at a time. So we can get a lot of subjects out on the table.

Mr. Turner.

Mr. TURNER. Thank you, Mr. Chairman.

Good morning, Governor. Thank you for being here. Thank you for the visit we had the other day. I am impressed, Governor, with the enthusiasm with which you have undertaken your job. I think it has meant a lot to all of us to have you in that position.

There is one issue I wanted to ask you to comment on. I know there has been some concern from the Census Bureau about the preservation of the original forms. I know the plans, I think, are to make only copies or the computer records being ones that you archive rather than the original forms.

Could you tell us a little bit about why that decision has been made? What are the pros and cons? I know it is something that the Census Bureau has expressed some concern about.

Mr. CARLIN. Historically, this has been the pattern. Only up until the 2000 census, the original documents—there was a microfilm copy and it was the microfilm copy that was the preservation copy, the access copy, the copy by which we distributed across the country to all our facilities and made available for rent. Once we had the microfilm copied, then the original questionnaires were always destroyed. That has been the pattern from the very beginning.

What is new and unique this year is that we are shifting to a new medium. For the first time, instead of microfilm, we are talking about electronic medium. What is left at issue, in my mind, is really two very significant things. One, we have not yet scheduled with the Census Bureau those electronic documents—the systems, et cetera. The existing schedule for the questionnaires that are temporary is in place, but communicated with that schedule—if they will be destroyed—is that they cannot be destroyed until they have made a copy on an appropriate medium. In this case, in the year 2000 it will be electronic. We have that work left with the Census Bureau to get that scheduling done.

The second thing I would assure you is that I am not signing those schedules until I am confident that this new first-time use of electronic systems, electronic technology, that we in fact have the information so that we can provide access—or obviously somebody else, 72 years later down the road—to those records. In that sense, it is very different. It is very sensitive and it is the first time. I can assure you that we will be very, very careful before we sign the schedules for those records, which would then allow the destruction—which we have always done. It has been the patter from the very beginning that the voluminous volume of originals are not practical to be kept as long as there has been made a copy—and of course to this time, it has been microfilm.

Mr. TURNER. So for the first time we will not microfilm, but there will be a computer file.

Mr. CARLIN. That is correct. They are being produced in electronic form. So access to them 72 years down the road will be very different. As I talked to my staff yesterday, thinking about some of the subjects we might discuss, one of the things we readily agreed was that it would be somebody else's problem to convert those microfilm reading rooms to electronic many decades down the road. But our responsibility is to make sure we have captured and secured that information—those census records—so that we cannot just preserve but provide access at the appropriate time.

Mr. TURNER. Specifically, what type of concerns have been expressed by the Census Bureau? Are they worried that these new computer records will not be as accessible as they were under the microfilm system?

Mr. CARLIN. I am not aware that they have expressed any concerns along that line. I am aware that my staff has worked very closely with them on the procedures, the development of the process—starting as early as 1995—beginning the discussion and communication back and forth.

I think the concern is more on our side in making sure that the scheduling gets done and making sure we are confident that the technology that we have been a part of describing and developing in fact can do the job.

Mr. TURNER. Thank you.

Mr. HORN. Let me pick up on Mr. Turner's question.

I was on the visiting committee once for the Stanford University libraries. One of the librarians came in and had 30 books there and started to snap them in half. We all just about fainted. But that is the problem with the acidic paper.

To what degree do you have that problem in the preservation of records and the wear and tear on paper since the 1830's?

Mr. CARLIN. This is a good followup question because that is again where microfilm plays a significant role and where we try to focus our energies on the limited resources we have for microfilming additional records, that is, microfilming those records that are used most frequently so that the access the researcher gets is through microfilm, not the original.

Obviously, this is a small portion of our holdings, but we focus on that for preservation purposes.

Mr. HORN. What do we know about magnets and other things that can upset an electronic data system? Suppose you had it all wiped out after this? Where is the record?

Mr. CARLIN. Well, if you are relating this to the past question, we are talking about a very nervous archivist in terms of making sure that we are confident in what we have.

I am going to yield to my Deputy in a moment, who has a little more direct expertise in this area. But that is why I want to make sure we get it. I do not know if the plan is to have a back-up preservation copy—I assume there is. That is the traditional way. But you are correct. As I stated in my opening remarks, one of the challenges of electronic records is that they are so easy to disrupt, so easy to erase.

Lew.

Mr. BELLARDO. The standard procedure that we have for electronic media would be to have an offsite back-up copy, which I guess we would call our preservation copy.

Mr. HORN. Where do you store that? In a cave somewhere?

Mr. BELLARDO. Well, we currently——

Mr. HORN. I am not being facetious. Get it away from effects that could be on them electronically.

Mr. BELLARDO. That is the case for microfilm security copies. We do have them actually in underground storage. The magnetic media are stored—unless there has been some recent change—in the Washington area, but offsite, therefore, we have the ability to generate another copy.

The other concern that the Archivist expressed is to be sure that the format that these materials would be coming to us—that we would be able over time to preserve that and to also provide access to it. We are working through those format questions with the Census Bureau.

Mr. CARLIN. The technology we will receive it on will be migrated several times before ultimate access. We cannot even imagine what technology might be like 75 years down the road, but we can assume it will be several generations—many, many generations—removed from what we experience today. So one of our issues is to make sure that we can migrate that information to a technology that would be in use at the time access becomes available.

Mr. HORN. The census records, you say, have been destroyed from past censuses?

Mr. CARLIN. The originals are destroyed once they are copied onto microfilm.

Mr. HORN. Did the person who was polled in that census—did they fill out a separate form saying 1860? 1870? 1910? What was the form?

Mr. CARLIN. The patterns have varied over the years, but it is my understanding that we have always microfilmed the original.

Mr. BELLARDO. Basically, what happened was the enumerator would walk down the street and question the individuals and they would make notations on the form. They would occasionally encounter people who did not want to be interviewed or whatever. But other than that, they did their best. You can actually track the street they were on and the addresses and so forth of the people they were talking to.

But generally speaking, it was not a form that people filled out themselves. I think the most recent census I participated in I actually got a mail-in form, filled it out, and sent it back in.

Mr. HORN. Let's say a President in 1860 and a President in the year 2000—it would seem to me to be very interesting to keep that document—the original. So what do you do with that? You burn Abraham Lincoln's interview and you burn William Jefferson Clinton's about-to-be interview?

Mr. BELLARDO. I think what has happened in the past is that at the time the microfilm was transmitted to us those records were in fact destroyed after the quality was checked.

In the case of Clinton—of course, in the case of Lincoln, it would not have been in his handwriting. It would have been the enumera-

tors handwriting. In the case of Clinton, presumably, if he has a mail-in form and mails it in, then it would in fact be in his hand.

Mr. HORN. There are a lot of people, as you know, interested in genealogy. You have the Mormon church, the Church of Latter Day Saints. They have great genealogy records. It seems to me that I would rather put these in State libraries—if it is a State—or someplace. Or make some money off it, to be blunt about it. We have everybody in their library who hangs up commissions by this or that President or confederate bonds or whatever it is. It seems to me there might be an interest in genealogy if one had one's ancestors records before they are burned. I would like nothing more than to have the records of my great grandfather from Ireland in the 1840's in Washington, DC.

There is a possibility there to make money for the archives in a trust fund, or an endowment, or whatever.

Has that been thought of?

Mr. BELLARDO. If I can return to the historical census, we have really been talking about the population schedules. The non-population schedules, which were also done during the 19th century—some of those survived in hard copy and actually some of those are deposited in State libraries or archives or the equivalent of that. We have some of them at the National Archives as well.

In terms of the 2000 census, we have not thought about that at this point.

Mr. CARLIN. You have given us something to think about, Mr. Chairman.

I would tell you, we have not been pressed by the genealogists on that subject as much as making sure that we get the information so it can be made available. The originals—we will take a look at that.

Mr. HORN. I have a real problem with microfilm—I will tell you—and to microfilm readers. The ones in the Library of Congress are a disgrace and they know my opinion on it. Maybe we will have to put a line item in their next budget to make sure that they get some decent microfilm readers. But I am going through about 50 years of records on microfilm in newspapers. I did that in research as a graduate student and other books and so forth. But it seems to me they are a horrible thing and there must be a better way to invent a decent microfilm reader where you can get focus and not have things blacked out on the page and all the rest of it. It depends on how the person held the object before they snapped the microfilm button.

That bothers me that records are just smudged and all the rest of it. In this case, it is the California State library and I am using the Library of Congress equipment to read it. But it bothers me.

So what do we do to improve that service?

Mr. CARLIN. Thanks to the support of Congress, starting in the year 2000, we have a sum of money to replace on a sane basis our microfilm readers in all our facilities across the country. Assuming we can find quality microfilm readers, we will not be talking about broken-down, ancient, poor-serving microfilm readers.

Mr. HORN. Let me move to another subject. I am not done with that, but in a report we might have something to say on it.

What would you say, Mr. Carlin, is the greatest challenge you face as Archivist?

Mr. CARLIN. I think the most significant challenge I face and that we at NARA face is the set of issues involving electronic records.

Mr. HORN. Are you issuing guidance to Federal agencies on these? How does that work? Is there another agency in the Government who is looking at the overall electronic use of records—just for operations, let alone archival purposes?

Mr. CARLIN. We are accepting the responsibility we have to work with agencies to provide them guidance. As I indicated in my testimony, we have established a group of our own experts, plus experts from Federal agencies, as well as outside experts to begin the process. In fact, very soon, the first set of advice going to agencies will be up on the web.

Clearly, we feel—not just because of our responsibility for those records scheduled permanent, but for all records, temporary as well that have an incredible value for a particular period of time—that we have a responsibility to work with the agencies. Our partnership with the Department of Defense to establish standards was an effort to start to provide guidance to the private sector to produce software that met certain standards that would be conducive to agency use today and our use as well as theirs down the road for future access.

Mr. HORN. Do you feel that industry is responding in terms of what you are seeking in the software?

Mr. CARLIN. They appear to be very interested in what we are producing. They obviously know the Federal Government is a large customer and they want to make sure they are providing something the Federal Government will buy. I think there is no problem here. The challenge is to make sure—as we have indicated—to DOD we are saying, This is one way to go. We are not saying it is the only way to the private sector or agencies.

Mr. HORN. The National Archives' fiscal year 1999 performance plan indicated that the business process reengineering plan would be complete in 1999. However, fiscal year 2000 performance plan notes that the reengineering plan is scheduled for completion in the year 2000. What is the cause for the delay?

Mr. CARLIN. We are talking about the business process reengineering of the scheduling and appraisal of our operation, I assume, if I heard you correctly.

The reason this is delayed is—first of all, we put this in our original strategic plan as a key challenge we needed to address. We set the time table which we thought was realistic. Then we faced a lawsuit, for one example, that took a great deal of our time and energy. With our limited staff and resources, we had no choice but to focus and suddenly make it a priority. That was one point that caused it to slip.

The second thing that caused it to slip is that the more we looked at the subject, the more we realized that initially there were major policy issues that needed to be addressed first before we even started the traditional BPR.

I would like to have my Deputy, who is working on this in terms of what we are really doing today, take a moment to share where we are headed on this very important task.

Mr. HORN. Fine. And as you know, we will have the GAO on the next panel. If you can stay, we will get a dialog on that report.

Mr. CARLIN. OK.

Mr. HORN. Mr. Bellardo.

Mr. BELLARDO. As we have been dealing with the GRS–20 guidance and bulletins and have heard back from agencies, one thing that has become clear to us is that the world is changing very rapidly in terms of how agencies are doing their work. In order to get a real sense of what the problems are that need to be addressed in a reinvention project relating to appraisal, scheduling, front-end, what our role should be, what the agency's role should be—we need to have a better picture of the way records are being created today, the role of the various players within the agencies—the IGs, the internal auditors, the general counsel's office, records managers, and so forth—and then how those records are being used.

We do know that there are developments with the web and how people are using information, how they are accessing it, and how they need it presented to them. We are interested in both the public as well as agency users of information.

On top of that, we think we need more information about how the records are actually being disposed of in the agencies. This is an area where the dialog has been with the GAO folks.

But we are not setting aside this reinvention effort. In the coming few months, we are going to be gathering information in the areas I have just talked about, feed that information to the policy review, and out of that build our as-is model and our to-be model in terms of how we feel we can be more effective in the agency scheduling and appraisal processes.

Mr. HORN. In July, when the General Accounting Office issued the report stating that the National Archives could learn from its planned baseline survey of Government-wide agency records management and could incorporate positive changes in their business process and reengineering plan, why did the Archives disagree with the GAO recommendation to move forward with the baseline survey?

Mr. CARLIN. Let me just say in general, from my point of view I do not think we have a disagreement. The initial baseline was heavily focused on just standard data elements, not the kind of information my Deputy feels very strongly that we need to know to do this right.

So in terms of communication, we stopped that part of it because we felt it was foolish to gather all that information if eventually the system was going to be changed and it would have to be done again. But from a practical point of view, what GAO was saying I think we are now doing. We think it is very important to know what is going on, to gather information. It is just that the original plan was very narrow and focused on detail rather than the kind of general knowledge that we needed that would only come from a different approach.

Mr. BELLARDO. I would like to first say that it is an excellent report. We were very much interested in it. I think if there is a fail-

ing here, it is perhaps in our ability to communicate what the original baseline was projected to be.

It was basically projected to be a review of how agencies are following our existing policies and procedures and so forth. What we are now about looking at is whether those policies are working and whether we need to look at other policies and other kinds of procedures. I think that is probably underlying the suggestions that are being made in the GAO report.

So I do not think we are really in disagreement as to where we need to be. It is just that in order to comment on the recommendation that we should do the original baseline as we outlined it, we feel as though that would not have helped us in the reengineering process.

Mr. HORN. My understanding is that the fiscal year 2000 performance plan aims to convert 10 percent of existing record series descriptions or finding aids to an on-line archival research catalog. Is that the way——

Mr. CARLIN. That is the direction I would want to check to confirm.

I would say in general that as an agency we are very supportive of GPRA and the targets—the performance aspect. We are very committed to our strategic plan. We were committed to that plan before, so all of this has worked very well together. But we did learn very early—although in general, in most areas we are achieving our goals—because we did not in many cases have good baseline information, we will be adjusting those goals to a more realistic set of targets as the 2000 is finalized as well as the 2001 developed.

Mr. HORN. Do you think you can hit the 100 percent mark by 2007? That is what presumably 10 percent means when you start in the year 2000. Is that a realistic timeframe?

Mr. CARLIN. We think it is realistic if we can secure, by one means or another, the resources to achieve that goal.

Mr. HORN. What do you need? Is it the hardware, the software, or both?

Mr. CARLIN. In this particular case, talking about the research catalog, it is just the challenge of populating. We have the resources to put the catalog together. That will be done very shortly—in terms of months, not years. But then it will be the challenge of populating it, getting everything in there, and that will be labor-intensive.

Mr. HORN. Have you asked for those resources in recent budgets? If so, has OMB cut you or supported you?

Mr. CARLIN. We have not specifically asked for resources to populate to OMB, so they have not—we have been supported for the resources we felt we needed through the 2000 budget to do because the focus through 2000, for the most part, is to complete the system, to get it up, operational, and running. Then the challenge ahead is populating, which we think can heavily be focused on existing resources, but we do not know at this point how far that will take us and whether in future years to be complete in 2007 we will have to add additional resources.

Mr. HORN. Agencies often rely heavily on websites to convey information to the public. To what extent does the Archives consider

materials on websites as permanent records and what guidance are you issuing to agencies for their preservation?

Mr. CARLIN. I am going to let my Deputy comment specifically on how we schedule web records. We see the web as an incredible opportunity to take our resources to people that never have the opportunity to visit one of our facilities. We also see it as an incredible opportunity to communicate more efficiently with our biggest customer, the Federal Government and all the agencies we deal with in terms of guidance we provide. Our hope is, in the coming years we will greatly expand how we use the web to communicate back and forth to make the processes that work through the life cycle of the record much more efficient.

But on the scheduling issue, I want to yield to my Deputy.

Mr. BELLARDO. First, a word about guidance.

We have been working and have an internal draft for records management guidance for agencies relating to websites. We are not happy with that draft at this point. One of the things we hope to be working on with this fast track team is the web guidance. We would hope that one of the projects they take up would be to refine the web guidance and really make it a tool that could be useful to agencies.

In terms of the scheduling aspect, what we are saying to agencies is that if you do not have a separate record file of the document that you are putting on the website, then these must be treated as records and must be scheduled. On that basis, we would do an appraisal and then make a determination as to which of those we will accept for accessioning.

From a practical standpoint, we are going to have to be looking in the future at creative ways—if I can use the word—to harvest that information in cooperation with the agencies because much of it, I suspect, will be very ephemeral if we do not act in a very proactive way.

Mr. HORN. To what degree do we know, in the Presidential libraries, the degree to which we have electronic records? Have they been destroyed? We think of the Ollie North situation where he can go through and wipe out a lot of the electronic records. What can we do to get the material into the Presidential libraries without a lot of ''throwing a few tapes overboard''?

Mr. CARLIN. There are a lot of things we can do. Obviously, the Presidential libraries—the Presidential records are more electronic to date than Federal records. So it has sort of led the challenge in dealing with electronic records going back two or three administrations.

The No. 1 thing we can do, Mr. Chairman, for the future, is to be much more aggressive as an agency and successful in working with a new administration from day one. The problems to this point have come from not knowing what should be done, to not being there with succeeding administrations to really assist them. It is our goal to be very aggressive with the new administration in the transition period following the 2000 election so that—particularly with electronic records, but not exclusively—we can provide the guidance, make sure the systems are set up.

As you are well aware, the bulk of Presidential records are permanent. It is a very different situation. We do not do the tradi-

tional scheduling. We start out with the assumption that they are permanent and go from there. So we are talking about a large volume of electronic records in various formats that are being preserved today for Reagan and Bush, for example, but in a difficult and expensive way. If we can get there up front and get it done right, we can save money and provide access much faster.

Mr. HORN. We put legislation in to provide for an orientation of Presidential appointees and nominees, regardless of who is President in 2000 and regardless of whether it is between the election and taking the oath of office because there is a continual number of appointees. I think it would be good—and I will have staff note it—that we also get into the archives role of that.

You are absolutely correct. Cabinet secretaries ought to be brought up to speed.

I remember in the Eisenhower administration we had three wonderful mail clerks in the secretary's room and those records were absolutely immaculate when they were turned over to the Eisenhower Library.

I think that would be very helpful.

I see we have a vote on. I will have to recess this so Mr. Turner and I can keep faith with our constituency, whatever that is over there.

Mr. CARLIN. We would not want that to be interfered with.

Mr. HORN. So we will be in recess for about 10 to 15 minutes.

[Recess.]

Mr. HORN. What can you tell me on records about the legislative branch and the degree to which you are getting them?

Mr. CARLIN. As you are aware, we are the custodian of the legislative records. I will let Lew comment in depth, but it is my feeling that Mike Gillette and his operation have established a very good relationship with both House and Senate and not only are we getting the records, but access is not only based on a schedule but congressional support for access. That support has significantly improved on the access side of things in the last few years.

Mr. BELLARDO. I am a previous head of the Center for Legislative Archives, and even at that point in the late 1980's and early 1990's we had a good rapport. I think Mike has been even more aggressive in working with the historical offices and with the committee staffs and so forth.

The sense that we have is that there is a very regular process of transferring materials. As you know, it is committee records and not the records of the individual Members' offices. Those are basically their records and they usually donate them to a university back home.

We are also doing some work on the Senate side as they are developing a new electronic records system in the Senate. We have staff who are involved in working with Senate staffers on that. I believe that cooperation is moving forward as well.

Mr. CARLIN. I would also add, Mr. Chairman, your new clerk is exceptionally well-grounded on records issues. We look forward to a very good relationship with him.

Mr. HORN. Thank you. Mike Gillette has done a terrific job, no question about it. I particularly enjoyed seeing what he had done for the schools of this country in terms of real-looking documents.

You would think they were the originals in terms of Thomas Jefferson, women's suffrage, and this sort of thing.

Besides the committee records, to what degree are you able to get the party records, such as the Democratic Caucus in the House and the Republican Conference in the House? I would love to see the notes Bobby Baker in the Senate kept on who got what position and what committee and this kind of thing. They could put a 50-year limit on it, but it would be great historical evidence that frankly you do not have right now. I do not know what they do with those, whether they dump them in the ash can or what.

Mr. BELLARDO. No, I do not think they do. I think we need to get back with you with more accurate information, but it is my understanding that there has been significant progress on the caucus records. Whether or not we have actually accessioned them at this point I am not sure. That is what we will need to get back to you on.

[The information referred to follows:]

Records of Party Conferences and Policy Committees
in
Center for Legislative Archives Holdings

House of Representatives

Republican Caucus/Steering Committee

HR 57A-F39.1, Republican Caucus, February 1902

Location: 8E3/8/23/1, Box 75 (open)

The records of the Committee on the Census includes a letter dated Feb. 20, 1902 from the chairman of the Republican Caucus to the Speaker of the House transmitting a unanimous resolution of the Caucus that a select committee be formed to investigate the validity of election laws and whether any eligible voter is being denied the right to vote.

Published Papers of the Republican Steering Committee, 93-102nd Congress

Shelved at the end of the records of the 102nd Congress. Location: 5E2/16/16/1, Boxes 44-48 (open)

Box 44: 1974-1975
Box 45: 1976-1978
Box 46: 1978, 1984-1985
Box 47: 1983-1985, 1987-1988
Box 48: 1990-1992

Arranged chronologically by year, this series includes various publications of the Republican Steering Committee including Bulletins (weekly), Legislative Previews (weekly), Fact Sheets (irregular), and Memoranda to the Steering Committee (irregular).

The 1975 binder includes an index as well as "Backgrounders," position papers on specific issues (ex., "50 Ways to Fight Inflation," "National Welfare Reform Act of 1975," and "Income Tax Indexing: The Possible Dream").

The 1970s boxes include the most variety of publications. There are **no publications for 1980-1982, 1986, 1989.** Bulletins are the only publications for 1983-1985, and 1987. The 1988 binder includes Voter Justifications as well as Bulletins. Since 1990 the primary publication appears to no longer be the Bulletin, but an untitled document resembling a press release; this publication comprises the bulk of the 1990-1992 records. A new publication, "Global Threat Alert," was added in 1992.

Senate

Republican Policy Committee

The Senate Republican Policy Committee has deemed its records and those of its predecessor, the Senate Steering Committee, **closed for 30 years**.

One accession of four boxes of minutes are **open** under the 30 year rule:

78-85th Cong., boxes 1-4 (97A-359)

The remaining accessions are either entirely closed or contain a mix of open/closed records. The series that are arranged chronologically and can be segregated by age are marked with an asterisk:

*89-99th Cong., boxes 1-14 (97A-360)
- Box 1: 1965-1967
- Box 2: 1968-1969

*86-100th Cong., boxes 1-3 (99A-439)
- Box 1: 1959-1961
- Box 2: 1962-1964

*78-93rd Cong., boxes 1-45 (98A-041) *no transfer sheet, for box list, see attached*
- Article Books, boxes 1-16, 78-87th Congress, **open**
- Memos, boxes 17-33, 1953-1968, **open**
- **NOTE: BOXES 34 & 35 ARE LESS THAN 30 YEARS OLD**
- Reports, boxes 36-37, **open**
- Staff Studies, boxes 38-44, 1961-1968, **open**
- Index to all series, **open**

103-104th Cong., boxes 1-6 (96A-178)

Republican Conference and Caucus

These records are subject to the **30 year rule** established by the Republican Policy Committee.

Our one accession from the Conference is **open** under the 30 year rule:

62-89th Cong., boxes 1-13 (99A-440)—all the records are **open**
- Boxes 1-11: Minute Books, 1911-1966
- Box 12: Seating Diagrams, 1915-1964
- Box 13: "Index to Legislation of the 73rd Cong., 1935-1936" and "Committee Book: 80th Cong., 1947"

Democratic Policy Committee

The records of the Democratic Policy Committee are subject to the **20 year rule**.

The first three accessions are printed voting records. These records were publicly available on the Hill and, therefore, are open to researchers. The remaining accessions are closed for 20 years.

84-91st Cong., boxes 1-7 (95A-030)—printed voting records-**open**
80-98th Cong., 7 FRCs of bound volumes (printed voting records)—**open**
95-97th Cong., boxes 95-001--97-003— voting records boxes-**open** *(8E2A/11/6/1)*

104th Cong., boxes 1-13 (96A-146) & boxes 1-8 (98A-090)
99-104th Cong. (videotapes at A2, with Democratic Technology and Communications Committee) (97A-469 & 98A-077)—index in Box 123
99-102nd Cong., boxes 1-6 (97A-008)
97-103rd Cong., boxes 1-21 (95A-506)
97-98th Cong., boxes 1-4 *(8E2A/2/9/5)*

Democratic Conference

These records were published by the Senate Historical Office. They are **open** to researchers.

Minutes: 1903-1962
2 rolls of microfilm of boxes 1-4 (location: *8E2A/10/12/4*, film in 8E2 microfilm drawer)
Box 1: 1903-1914
Box 2: 1915-1933
Box 3: 1937-1950
Box 4: 1951-1962

Democratic Conference, Policy Comm., Senatorial Campaign Comm., and Steering Comm.

Karen Paul is discussing this accession with Dick Baker. This is an artificial collection that ended up in the custody of the Secretary of the Senate. The records will be closed at least 30 years. Pending further notification from Karen, the records remain **closed regardless of age.**

Various dates, boxes 1-8 (98A-135)

Box List for 98A-041, Republican Policy Committee, 78-93rd Congress

Article Books, Boxes 1-16

Box 1: 81st Cong.
Box 2: 82-83rd Cong.
Box 3: 84-85th Cong.
Box 4: 86th Cong.
Box 5: 87th Cong.
Box 6: 78-79th Cong.
Box 7: 80th Cong.
Box 8: 81-82nd Cong.
Box 9: 82-83rd Cong.
Box 10: 84th Cong.
Box 11: 84th Cong.
Box 12: 85th Cong.
Box 13: 85th Cong.
Box 14: 86th Cong.
Box 15: 86th Cong.
Box 16: 86-87th Cong.

Memos, Boxes 17-35

Box 17: 1953
Box 18: 1954
Box 19: 1954
Box 20: 1955
Box 21: 1956
Box 22: 1957
Box 23: 1957-1958
Box 24: 1959
Box 25: 1960
Box 26: 1960
Box 27: 1961
Box 28: 1961
Box 29: 1962
Box 30: 1963
Box 31: 1964
Box 32: 1965-1966
Box 33: 1967-1968
Box 34: 1969-1970—still closed
Box 35: 1971-1973—still closed

Reports, Boxes 36-37

Box 36: "Labor Union Political Expenditures" (1955)
"Americans for Democratic Action" (1958)
"Americans for Democratic Action" (1955)
"ABC's of Federal Aid to Education" (1961)

Box 37: "Status of Legislation, 87th Congress, 1st Session" (1961)
"Rules of the Senate-Cloture" (1967)
"Middle East Crisis" (1958)

Staff Studies, Boxes 38-44

Box 38: 1961-1962
Box 39: 1963 (also Press References, 1962)
Box 40: 1963
Box 41: 1963
Box 42: 1964
Box 43: 1965-1966
Box 44: 1967-1968

Index to All Series, Box 45

Mr. HORN. I will give you another example that you might get them collecting, then.

When I first came here, I started collecting each flyer that is used on the floor to pass or to not pass a bill. No one has ever done it. I have 6 years and I am going to keep it. [Laughter.]

Somebody around this place—once I am not here—should be doing that because it is fascinating in terms of what they say is in that bill versus what is in the bill. I can put a lot of——

Mr. CARLIN. We will make sure we pass that one along.

Mr. HORN. It would be a fascinating little comparison.

We were talking about websites. You project that in fiscal year 2000 the Archives will process and release 75 million pages of agency records for access. What portion of the total amount of records are backlogged and need processing of that 75 million? Is that a realistic schedule?

Mr. CARLIN. Are we talking about classified records?

Mr. HORN. Mostly, yes, it is classified records.

Mr. CARLIN. How much progress we make is obviously impacted by additional responsibilities we are given. We estimate, for example, the Lott amendment, which will require us to go back and revisit page by page a lot of records that have already been declassified and in fact are out on the shelf. The latest estimate that has been given to me is some 200 million pages that will have to be gone through page by page which will slow us down in terms of how much we can get done under the challenge of declassifying records that have never been declassified.

As you are well aware, we are heavily dependent upon the agencies to provide us guidance. If they provide us guidance, we can do the work. If they do not provide us guidance, then all we can do is try to facilitate, encourage, support, assist, fix up a nice room for them, provide them support, bring the records, encourage them to come down to do the work. What really gets challenging is where you have multiple equities in one record where you can get the Air Force to declassify it but the Army hasn't. So until all the equities have been resolved, you do not have an open record.

Mr. HORN. On that point, somebody told me a couple of years ago that we still have some World War I records that have not been declassified. Is that true?

Mr. CARLIN. Yes. And my Deputy would like to comment on this. We also have the formula for disappearing ink classified. Although I never ate the right cereal, my Deputy might share his experience.

Mr. BELLARDO. I understand that there are such formulas available to those who eat the right breakfast cereals. But I do not know if we can go into further detail than that. The information is——

Mr. CARLIN. My Deputy is much more sensitive to CIA restrictions than the Archivist. [Laughter.]

Mr. HORN. But who has control over those World War I records?

Mr. CARLIN. The agencies that still maintain an equity in those records. If they had provided us guidance, they would be open. But they have not. So by law they have total control.

President Clinton's Executive order—a more aggressive order than previous Executive orders—put a deadline. But now there has been and will be a postponement of that deadline and the new administration ultimately will deal with whether that deadline will in

fact be real or not. But it did put some teeth in and the massive amount of declassification that has been done in the last 3 years is directly related to the strong orders that were issued in that particular Executive order.

Mr. HORN. The Executive order cannot trump a law, so do we need a law to say that all the records relating to World War I should be released?

Mr. CARLIN. We would certainly be interested in any legislation that would encourage access. We are as sensitive as anyone to inappropriate declassification. There have been multiple discussions in the last few years—as you are well aware, Mr. Chairman—on ways to take lessons from Executive orders and put it into the law. There has not been much progress to this point.

You have been involved and supportive of—Nazi war crimes records have a particular emphasis right now. We are making progress in that area and a lot of records are being opened that would not have been opened without that leadership. But a more across-the-board systematic approach would be the most conducive for efficiently dealing with declassifying records in a way that is appropriate.

Mr. HORN. Should there be a special commission of outsiders and insiders to do that? Or do we just say, Do it, and forget about it? Who has the records on World War I? Where are they?

Mr. CARLIN. To those agencies that would be responsible, it would—from our perspective, we would like to have generic across-the-board guidance that would lead to action rather than a special committee that would pick and choose. It is less efficient and we feel ultimately will not serve the best interest. But we would certainly welcome the opportunity to discuss what legislation might be able to provide and followup on the successes and the lessons we have learned from Executive orders.

Mr. HORN. Does the Archives have the papers from World War I that have not been declassified? Is it under your custody?

Mr. CARLIN. Under our custody to store them, but we do not have the authority to declassify them ourselves.

Mr. HORN. But you have the records? Or does the Department of Defense have it?

Mr. BELLARDO. We have basically a half dozen documents that are still classified from World War I. We have many other records from World War I that are not classified. But I do not believe that we can with absolutely certainty state that there are no classified records in an agency's physical custody from that period. We do not know, so I cannot answer you.

Mr. HORN. Have we ever asked the question of them? It seems to me, in response to a congressional committee, the Archives ought to be able to ask the Department of Defense, the military historians over there, what are the holdings and where they are held.

Mr. CARLIN. I think that is absolutely appropriate and one of our long-term intentions in changing the culture of NARA to where, in terms of our relationship with agencies, we are much more proactive, we are partners with them. One of the issues in terms of our scheduling reappraisal is the issue of inventorying the

records that exist. It is one of the first steps an agency needs to take to make sure all the records are scheduled.

Yes, I think it would be very appropriate for us to work with agencies to get out on the table and make sure that we have a better opportunity to address records that have been held that we are not even aware of.

Mr. HORN. Could you explain for the record the Kyl and Lott amendments and what impact they can have on the Archives and your resources?

Mr. CARLIN. The Kyl amendment was focused on existing classified records in the pipeline, records that have not been declassified. But instead of the traditional way, through guidance and decisions, using more of a bulk approach, the Kyl amendment focused on a page-by-page review. When you are talking about millions and millions of pages of records, the resource issue changes rather significantly when you go from a more bulk approach to page-by-page.

We have tried—and are in the process of working out on the Kyl amendment—a set of procedures which really were assigned to us as part of that legislation that we sit down and work with. The focus with the Department of Energy, for the most part, is that we develop ways to identify where logical focus ought to be for the page-by-page and reduce the quantity that must be looked at page-by-page.

I think ultimately we will be successful with that.

The Lott amendment takes the next step, you might say, in going toward page-by-page review of already declassified records, records that are out on the shelf, records that have been in the public arena. There again, we are trying to take a look at ways we can narrow that universe so that we can have some kind of consensus on where it is possible, most likely, that a mistake might have been made, where records that should not have been declassified in fact are out on the shelf.

It obviously requires an even more significant burden and certainly puts on the table a set of records that we had assumed were now open and beyond the challenge of declassification.

Mr. HORN. What led to this? Was there something that bothered somebody around here?

Mr. CARLIN. What led to this was the concern of premature release of records, of information in terms of nuclear energy that were being shared overseas. Some of the scandals that have been the focus of the last couple of years have caused Members of Congress—and from that perspective, rightfully so—to question and be concerned. Out of that came these two concepts to—on behalf of making sure that records that shouldn't be out there are not out there.

Mr. HORN. Generally, that judgment would be made, I presume, by the Nuclear Regulatory Commission. Or would it? Or would it be made by the defense group within the Department of Energy?

Mr. CARLIN. Now it is a matter of going back to these entities and working with them. Initially, particularly on records that are already declassified, they would have been declassified either by the entity—the agency themselves—or through guidance they provided to us for us to do the work. So it is a matter of going back and rechecking work that has already been done.

In the case of the Kyl amendment, it is a more intense focus on what has already been done, but done in a broader, more general way than the page-by-page.

Mr. HORN. Are we talking about hiring a number of nuclear physicists for the Archives who could understand what is in those documents?

Mr. CARLIN. Mr. Chairman, that is why in most cases—in this specific example—we will not receive guidance to do it on our own, but we will be working with the agencies. I think it would be inappropriate for us to come to Congress and ask for the resources to have expertise in all the technologies. When we get into a technology, an area of science like nuclear energy, that is where we should work with the scientists. But it is our responsibility to push the envelope and try to bring them to the table so that in an appropriate way these records are dealt with and open to the public.

Mr. HORN. I am told that it is possibly 513 million records that might be subject to the Lott amendment?

Mr. CARLIN. That is correct. We are hoping to—through discussions and negotiations—lower that to about 200 million.

Mr. HORN. And would it be a sampling? Or page-by-page review? Or how detailed will it be?

Mr. CARLIN. It is my understanding that it is to be page-by-page.

Mr. HORN. Your appropriations committee will be interested in that.

Mr. CARLIN. And we intend to keep them in the loop on this issue.

Mr. HORN. Let's move to State archives issues for awhile.

You and I have chatted about this and the possibilities of partnerships. We have some very fine State archives in this country.

What is the relationship between the National Archives and the State archives? What could be deposited within those libraries to save you space for some things that pertain to the history of that State?

Mr. CARLIN. We partner in a variety of ways, Mr. Chairman. As you are very personally aware, one of the areas is through the National Historical Publications Records Commission, our grant-writing entity, where we provide grants to State and local units to assist them in archival records management challenges.

The benefit there is multiple—not just to the entity that receives the grant—but the other State and local entities that can benefit from what was learned with the carrying out of that grant. A lot of times there are examples where they have done demonstration work that has been beneficial to us because our work is basically the same. So NHPRC is an incredible entity for us to partner with State and local.

But it is really broader than that because we share not only similar responsibilities. As I have indicated to you, I am very much aware, as a former Governor, that much of what is done at the State and local level is done with Federal money. But once the responsibility shifts to the State and local unit—once the money has been delivered—the records that are created are State and local records. So I have taken a real interest in a variety of ways of making sure we work together.

When we worked on the standards of the storage of records, Lew and I worked very closely with inputs from the States and across the country because they were interested in those standards. When we have tried to deal with some of the electronic guidance challenges—they have similar challenges—we have likewise tried to partner with them to make the most of the combined resources that we can bring to the table.

In terms of there being a site for the storage of records, we do have what we call an affiliated archives system. Compared to what you might be alluding to, it is very modest. But we have examples of Federal records, archival records, permanent records that are stored in a non-Federal facility for various unique reasons—usually a specific collection rather than a more broader, general purpose.

We do try, in terms of the direction you are headed, to make sure—where it is good archival practice—to have records of a particular interest to an area that those records are deposited in a regional archive rather than a Washington archival facility.

Mr. HORN. I think there is a lot to that.

You know the Smithsonian is now loaning a number of artifacts from its collection to university museums, city museums, and that has been very helpful in broadening the opportunity for people to look at a particular period of art, or whatever it is.

Mr. CARLIN. Mr. Chairman, we are doing something somewhat similar, but not in a massive way. We do loan particular records of significance to a particular area for a time, assuming preservation security issues can be agreed upon.

Mr. HORN. What do we know at the national level about the state of various State archives? Is there an accrediting group to tell us which States are prepared to handle the turning over of records which pertain to those States?

Mr. CARLIN. The bulk of what we know comes through our work with NHPRC and the State advisory groups that are set up. There have been, over the years, a number of projects where the results have provided us some information. As I indicated to you in a conversation we had last week, we do not have a program right now where we go out and analyze in depth, State by State.

I think it could be justified because, as I said earlier, there is a lot at stake in terms of—purely from a congressional point of view on accountability for the programs you pass—being able to document what is really happening with those programs, you need State and local records to make that accountability really work.

Mr. HORN. The gentleman from Texas?

Mr. TURNER. Thank you, Mr. Chairman.

Governor, I wanted to inquire into this issue of archiving e-mail records. I was interested in your statement about the ability of the San Diego Supercomputer Center to basically preserve 2 million e-mail messages in 2 days time. Yet I understand there are questions about—once you preserve the records—whether you have the computer system that can then go read those records.

What is the status? And what is the Archives' position on preservation of e-mail records by the various agencies? And how are we going to accomplish that?

Mr. CARLIN. First of all, I think it is very important to understand that the medium on which something is presented, con-

tained, or printed does not determine whether it is a record. A record is a record, whether it is on an electronic system, textual, microfilm, whatever. So the same applications apply. The unique challenges are there, certainly in terms of e-mail.

One of the principal issues we are dealing with with the San Diego Supercomputer Lab is to address what you are really raising here. Until we have the capacity to not only take in, preserve, and provide access in an electronic system, we cannot really have the capacity in that way to deal with e-mail. Now, in many cases where agencies do not have the electronic recordkeeping system—which is the bulk of them—they print out paper. That was part of the discussion with the lawsuit we got involved in and some of the aspects of that.

But ultimately we want a system by which we can take those e-mail records in electronically, preserve them, and make them accessible electronically.

Do you want to add anything?

Mr. BELLARDO. Just one of the aspects of this we are working on this year. We have a prototype that is being built for the reference end of this set of systems. By the end of this year, we believe that prototype testing will be complete, which was basically to determine—once you have it preserved—how you can make it available for people to use in an on-line environment. We are very hopeful that this prototype will work well and that that would feed to the larger project that would involve all the processes we would have to do to bring the materials in, to preserve them, to put them in a neutral environment or hardware/software independent environment, and then to make them available.

We are excited about this prototype and are looking forward to seeing how this works out.

Mr. TURNER. Since agencies and Presidents have been using e-mail, how much of it have we preserved? How much do we have access to? And once you capture it, is it in a form that will last? Or are there some problems with it deteriorating over time?

Mr. CARLIN. In the case of Presidential records, that is one of the issues I alluded to earlier indirectly when I said that we must get there at the beginning of an administration to get the system set up right. We have gone to extraordinary means to be able to recapture and ensure documentation that was created in the Reagan, Bush, and Clinton administrations. I think in the end we are going to be successful and we will be able to say that we have those records and be able to provide access to them.

But it was not done efficiently and certainly not without great cost. The bulk of the agencies are printing out e-mail that are Federal records in paper and we would be dealing with them, for the most part, in the regular way.

Mr. TURNER. That must be a very inefficient way of trying to preserve those records.

Mr. CARLIN. Absolutely. But until we have systems set up to be able to preserve and provide access long-term, it is the short-term transition procedure that we must continue to use.

One of the decisions out of the lawsuit was in this area and policy-wise we made the decision—separate from the lawsuit—that all program records should be scheduled, including the electronic cop-

ies of records. That is one of the issues we are working on to carry out ultimately, how we do that with agencies to make sure that even the electronic copy—there is an opportunity for the public to comment on how long it should be kept. If the recordkeeping copy is the textual one and it is a permanent one, it will be the permanent. But the decision is that the electronic copy—there should at least be on program records a review of how long it is kept because it might in the short-run be very valuable for a period of time.

Mr. TURNER. Are the e-mail records of past Presidents available at the Presidential libraries today?

Mr. CARLIN. They will be, as the law provides and processing has taken place, yes.

Mr. TURNER. In hard copy? Or is it available in some accessible form on the computer?

Mr. CARLIN. I think there will be some electronic access, yes.

Mr. BELLARDO. Until we have a full system in place, we will be basically using simple viewers for people to be able to view the messages. The next step beyond that would be moving this prototype to an operational pilot and then a full-blown reference system. That is a few years out.

The first step would be simply to be able to view them as opposed to having very sophisticated searching capabilities and so forth. But that is being built. It is certainly the case for Reagan, Bush, and Clinton—their records will be in electronic form and not just on paper.

In fact, we have just worked out an agreement with the Office of Administration relating to the transfer of formats and processes by which we will get the Clinton e-mail. You can see why we are so excited about this prototype. We want it to work.

Mr. TURNER. Thank you.

Thank you, Mr. Chairman.

Mr. HORN. Thank you very much.

Let me pursue a few closing questions here on this panel and then we will have the GAO and others come forward.

Just for the record, what is the current funding level of the National Historical Publication and Records Commission?

Mr. CARLIN. For the basic program, it is $6 million.

Mr. HORN. Has that changed at all over time?

Mr. CARLIN. The current fiscal year will be the second year at the $6 million level. It has gone from $4 million to $5 million to $5.5 million to $6 million.

Mr. HORN. How much money could we use there?

Mr. CARLIN. I think it depends a lot on whether the program is reevaluated and redesigned. There is some interest across the country among State archivists at taking a bigger picture look at particularly their records management challenges in the State and local areas. At this point, based on applications that come in, we are able to fund almost all of the quality projects. We seldom turn down.

In fairness, a lot of the not so acceptable are screened out before they even come to the NHPRC. So if you were to look at the total universe in terms of ideas being proposed, we would not be funding almost 100 percent. But of the ideas that come through the screen-

ing process of the advisory committees, the current level takes care of the funding.

That does not mean it takes care of all the need. But the way the current program is designed, it takes care of those who apply.

Mr. HORN. Could you just file, for the record, the number of projects that are underway now and the ones that were completed in the last 2 years so we can get a feel for what type of work—I assume it is getting together, say, papers for a particular person in American history and this kind of thing.

Mr. CARLIN. It is divided into two areas, generally, the documentary side. I believe the last I can recall of last fiscal year there were about 43 or 44 projects. The other half is in the records management archival area and I think there were 30 projects. The average grant is in the neighborhood of $72,000.

The big documentary projects that take larger sums and a variety of other projects—I think there are 43 or 44 documentary projects in operation at this point.

Mr. HORN. Without objection, that information will be put in the record.

[The information referred to follows:]

National Historical Publications and Records Commission
National Archives and Records Administration
700 Pennsylvania Avenue, NW
Washington, DC 20408-0001

Grants Awarded by
The National Historical Publications and Records Commission
November 1996 through November 1999

I. Electronic Records Project Grants:

a. Active Projects:

The Regents of the University of California, San Diego, CA: up to $300,000, on behalf of the San Diego Supercomputer Center at the University of California, San Diego, to conduct research on long-term preservation of and access to software-dependent electronic records.

University of Connecticut Libraries, Storrs, CT: up to $10,000 for a project to develop a strategic plan for identifying, preserving, and providing access to electronic records at the University of Connecticut

Indiana University, Bloomington, IN: $171,374 for a project to implement and test the methodology for evaluating electronic recordkeeping systems developed under NHPRC Grant no. 95-033.

Kansas State Historical Society, Topeka, KS: $74,996 for its Electronic Records Applied Research Project to: 1) conduct applied electronic records management research by testing key elements of the NHPRC-funded electronic records management and preservation guidelines; 2) evaluate the feasibility and effectiveness of the guidelines; and 3) modify the guidelines based upon the research results.

Maine State Archives, Augusta, ME: $85,235 for a project: 1) to develop state-wide policies for the identification and retention of permanently valuable electronic records; 2) to develop specific procedures for ensuring that permanently valuable electronic records are identified, retained, and accessible; and 3) to implement a plan for state-wide adoption of the policies and procedures developed.

Michigan Department of Management and Budget, Lansing, MI: up to $190,255 for a project to test the ability of records management applications (RMA) to classify, store, and manage the disposition of electronic records created in state offices.

Regents of the University of Michigan, Ann Arbor, MI: $104,845 for a project entitled "Preserving Electronic Records of Collaborative Processes," to conduct an analysis of recordkeeping practices in six private-sector environments with the goals of producing case studies, assessing the degree to which functional requirements for electronic recordkeeping are applicable in settings without highly structured business processes, developing guidelines for electronic recordkeeping in such settings, and publishing a monograph based on this study.

Minnesota Historical Society, St. Paul, MN: $90,031 for the Society's electronic records project, to establish electronic records pilot programs with two state agencies in order to evaluate the metadata the agencies produce, determine the applicability of that metadata to archival concerns, and establish a set of "best practices" and guidelines that will provide incentives for other state agencies to document their

information systems and provide the basis for a functioning, sustainable electronic records program within the state archives.

Mississippi Department of Archives & History, MS: $171,887 to establish an electronic records program in conjunction with the planned design of and move to a new state archives building.

The Research Foundation of the State University of New York, Albany, NY: $381,332 for a project entitled "Secondary Uses of Electronic Records," to develop guidelines to support and promote long-term preservation of and access to public electronic records of value to secondary users, including historians and other researchers. The project will examine the factors that contribute to or impede secondary use of records, then use applied research methodologies to assess technology tools, management strategies, and resource-sharing models for their potential to facilitate such access.

Cornell University, Ithaca, NY: $123,928 for project entitled "Archival Electronic Records Practice," to study the types of archival electronic records produced on the college level within a large university. The goal is to initiate discussions and provide recommendations that will form the basis for future efforts to implement best practices for electronic recordkeeping for Cornell s centralized university information system (Project 2000).

State University of New York, Albany, NY: $424,796 for its Long-Term Preservation of Authentic Electronic Records Project to fund the non-NARA elements of the U.S. research team participating in the InterPARES Project, an international research initiative to develop the theoretical and methodological knowledge required for the permanent preservation of authentic records created in electronic systems.

Rhode Island Office of the Secretary of State, Providence, RI: $49,794 for a project to develop an electronic records program development model and starter's manual for small state archival programs.

University of South Carolina, Columbia, SC: $222,440 for the Model Editions Partnership to: 1) complete the markup guidelines, reference guide, and encoding report for electronic historical editions; 2) publish five mini-editions to explore the effectiveness of automated conversion; 3) prepare and publish two mini-editions to demonstrate the interoperability of SGML digital library resources; 4) develop a series of utilities to automate the conversion of project word processing files into SGML files; and 5) prepare and publish a study describing the uses of documentary materials in an electronic environment.

University of Vermont and State Agricultural College, Burlington, VT: up to $20,000 to develop rigorous research goals and methods for testing various methods of providing intellectual access to electronic versions of the texts of historical documents.

b. Completed Projects:

Alaska Department of Education, Alaska State Archives, Juneau, AK: $10,000 to hire an electronic records consultant.

Association of Research Libraries, Coalition for Networked Information, Washington, DC: $20,000 for a project entitled "Improved Access to Electronic Records," to develop, offer, and evaluate a pilot workshop that will bring together teams of archivists and information technologists to explore electronic records issues.

WGBH Foundation, Boston, MA: $60,000 to develop and build support for a Universal Preservation Format (UPF) for audio and video digital recordings.

Syracuse University, School of Information Studies, Syracuse, NY: $99,993 for a project: 1) to evaluate the degree to which Federal and state government agencies are addressing records management and archival concerns in the management of World Wide Web sites; 2) to develop a set of model "best practices" guidelines for incorporating records management and archival considerations into Web site management; and 3) to promote use of the guidelines by print and electronic dissemination and through briefings of Federal and state officials.

City of Philadelphia, Department of Records, Philadelphia, PA: $117,862 to complete the third and final phase of the Philadelphia Electronic Records Project. The overall goal of the project is to develop comprehensive recordkeeping policies and standards for the city's information technology systems. Phase III would extend testing of the functional requirements for electronic recordkeeping developed by the University of Pittsburgh in a related NHPRC-supported project.

University of South Carolina, Columbia, SC: $219,344 for the second half of a three-year project known as the Model Editions Project to address both the scholarly and technological issues involved in developing new approaches to enhance intellectual access to documentary editions using an international standard for text markup (the Standard Generalized Markup Language [SGML]) and guidelines for the use of SGML developed by the Text Encoding Initiative (TEI).

II. State Board Administrative Support, Planning, and Plan Implementation Grants:

a. Active Projects:

Alaska State Archives, Juneau, AK: $19,998 to fund the administrative expenses of the Alaska board for two years.

American Samoa Government, Pago Pago, AS: $10,000 to implement its 1998 strategic plan, focusing on the preservation and use of historical records relating to American Samoa and the training of historical records repository personnel.

Arizona State Historical Records Advisory Board, Phoenix, AZ: $12,850 to fund the administrative expenses of the Arizona board for two years.

California State Archives, Sacramento, CA: $59,020 for its SHRAB Statewide Planning Project to: 1) investigate the programs of the state archives to determine the condition and needs of state records; 2) survey counties and cities to determine the condition and needs of local government records; 3) survey a representative number of the state's historical records repositories to determine the condition and needs of non-governmental records; and 4) develop a strategic plan, including a mission statement, goals and objectives, and funding priorities.

Delaware Public Archives, Dover, DE: $17,553 for its SHRAB Strategic Planning Project to develop a strategic plan with emphasis on possible cooperative opportunities related to the completion of a new archives facility.

Florida Department of State, Division of Library and Information Services, Tallahassee, FL: $9,900 to fund the administrative expenses of the Florida board for one year.

Idaho State Historical Society, Boise, ID: $64,200 for its SHRAB Records Assessment and Strategic Planning Project to assess the status of records in the state and prepare a strategic plan that addresses identified needs.

Illinois State Archives, Springfield, IL: $58,291 for its SHRAB Strategic Planning Project to identify and address records needs and issues within the state.

Kansas State Historical Records Advisory Board, Topeka, KS: $55,815 for a strategic planning project to assess the board's mission and vision, evaluate two recent repository surveys, identify issues for further planning and prioritization, and establish task forces to develop specific strategies.

Massachusetts State Historical Records Advisory Board, Boston, MA: $69,302 for an 18-month, strategic planning project to consider the board's mission and goals, identify strategic issues, and involve stakeholders in developing an action agenda and plan.

Maine State Historical Records Advisory Board, Augusta, ME: $19,895 to fund the administrative expenses of the Maine board for two years.

Minnesota Historical Society, St. Paul, MN: $72,571, on behalf of the Minnesota SHRAB, for Agriculture and Rural Life: Documenting Change, a cooperative project with the North Dakota SHRAB.

Friends of the Missouri State Archives, Jefferson City, MO: $9,295 to fund the administrative expenses of the Missouri board for one year.

North Carolina Department of Cultural Resources, Raleigh, NC: $37,600 for its SHRAB Administrative Support and Implementation Project to continue implementation of the 1993 strategic plan and to update and review plan progress.

New Mexico State Historical Records Advisory Board, Santa Fe, NM: $39,007 for an 18-month, strategic planning project to address key issues in the identification, preservation, and access to the state's historical records. The project will assess the board's mission and authority, develop strategies to increase its effectiveness, create a network of repositories and institutions, assess the historical records environment, and develop a statewide plan to guide the board in its work.

State Historical Society of North Dakota, Bismarck, ND: $15,608 to fund the administrative expenses of the North Dakota board for two years.

Nebraska State Historical Society, Lincoln, NE: $4,099 to fund the administrative expenses of the Nebraska board for two years.

New Jersey Historical Records Advisory Board, Trenton, NJ: $33,100 to produce a strategic plan for ensuring preservation and access to state historical records.

New York State Education Department, Albany, NY: $9,900 to fund the administrative expenses of the New York board for one year.

Ohio Historical Society, Columbus, OH: $13,458 to fund the administrative expenses of the Ohio board for two years.

Pennsylvania Historical Records Advisory Board, Harrisburg, PA: $45,157 to prepare a strategic plan addressing the identification, acquisition, preservation, and access of the state's historically valuable records.

Puerto Rico Historical Records Advisory Board, San Juan, PR: $42,119 to conduct a major assessment study and develop a long-term plan for preservation of historical records in Puerto Rico. The grant will also provide support for the initial organization of the board and training in strategic planning.

South Carolina State Historical Records Advisory Board, Columbia, SC: $6,952 to fund the administrative expenses of the South Carolina board for 16 months.

South Dakota Heritage Fund, Pierre, SD: $20,462, on behalf of the South Dakota SHRAB, for its SHRAB Archival Resources Planning Project to support reactivation of the board and creation of a statewide plan for the preservation of historical records.

Texas State Library and Archives Commission, Austin, TX: $5,258 to fund the administrative expenses of the Texas board for 14 months.

Wisconsin State Historical Records Advisory Board, Madison, WI: $53,328 for a 21-month project to build on and implement key parts of its recently completed five-year strategic plan by strengthening partnerships between the board and three statewide organizations: the Wisconsin Council for Local History, the Wisconsin Association of Public Librarians, and the Wisconsin Registers in Probate Association.

Wyoming Department of State Parks and Cultural Resources, Cheyenne, WY: $9,768 to fund the administrative expenses of the Wyoming board for one year.

b. Completed Projects:

American Samoa Historical Records Advisory Board, Pago Pago, AS: $10,000 for a one-year project to produce a strategic plan for the historical records of American Samoa by compiling information gathered through two planning conferences, historical records workshops, meetings, surveys, and seminars.

Connecticut State Library, Hartford, CT: $19,843 to help the Connecticut State Historical Records Advisory Board improve the state's educational and training programs for the management of historical records.

Florida State Historical Records Advisory Board, Tallahassee, FL: $15,500 to evaluate and revise its 1994 strategic plan in order to address new and changing issues faced by the state's archival and records community.

Office of the Secretary of State, Georgia Department of Archives and History, Atlanta, GA: $21,762 for a planning project to develop minimum standards for records repositories, prepare an institutional self-assessment tool, create a resource manual to enable repositories to improve their records programs, conduct a pilot project to test the self-evaluation tool and training methods utilizing the resource manual, and prepare an updated version of the directory of state historical organizations and resources.

Maine State Historical Records Advisory Board, Augusta, ME: $12,396 for a two-year board planning project. The board intends to use information gathered during its recent regrant project and from public board meetings to be held across the state in order to update its current plan.

Minnesota Historical Society, St. Paul, MN: $23,568 to enable the Minnesota Historical Records Advisory Board to continue its planning process and to support the implementation of identified priorities.

Montana State Historical Records Advisory Board, Helena, MT: $5,841 for a one-year project to complete planning efforts which are presently underway.

North Dakota State Historical Records Advisory Board, Bismarck, SD: $22,760 for a two-year project to monitor and update the board's long-range plan and to implement key recommendations of the plan in the area of training and professional development.

Nebraska State Historical Records Advisory Board, Lincoln, NE: $13,562 for a two-year project to implement selected high-priority recommendations from the board's strategic plan.

Ohio Historical Society, Columbus, OH: $6,686 for a planning project to enable the Ohio Historical Records Advisory Board to hold quarterly meetings and continue its efforts to implement its current long-range plan.

Oklahoma Department of Libraries, Oklahoma City, OK: $5,152 to fund the administrative expenses of the Oklahoma board for two years.

South Carolina Historical Records Advisory Board, Columbia, SC: $29,340 for a planning project to evaluate progress on the board's 1994 plan, publish and distribute a report and a revised plan based on this evaluation, reassess the board's own mission, develop criteria for evaluating progress on the revised plan, and sponsor workshops and conferences on historical records.

Tennessee State Historical Records Advisory Board, Nashville, TN: $4,000 for a one-year planning project. Under this planning project, the board would complete its strategic plan, and undertake priorities established in its plan.

III. State Board Regrant Project Grants:

a. Active Projects:

Georgia Historical Records Advisory Board, Atlanta, GA: $100,000 matching and an additional grant of up to $100,000 matching for its Regrant for Historical Repositories Project, which seeks to promote archival planning and cooperation, education, preservation, access, and the use of technology in Georgia's repositories.

Massachusetts Historical Records Advisory Board, Boston, MA: $150,000 for its SHRAB Collaborative Action Regrant Project to help local repositories increase the accessibility of historical records, improve the documentation of Massachusetts history, develop networks that can have a long-term impact on records and the historical records community, identify permanent funding sources for outreach and grant programs, and revise the strategic plan.

Montana Historical Records Advisory Board, Helena, MT: $57,746 ($20,000 matching) for its Local Records Regrant Project to help local historical societies, museums, counties, or other historical records repositories identify and preserve historically valuable records and make them accessible to Montana citizens and other researchers.

New Mexico Historical Records Advisory Board, Santa Fe, NM: $156,499 ($25,000 matching) and an additional matching grant of $25,000 for its SHRAB Plan Implementation and Regrant Project to implement the board's strategic plan, develop and conduct a training program to address the needs of repositories throughout the state, and support projects to improve preservation and access to historical records in New Mexico's repositories.

Nevada State Historical Records Advisory Board, Carson City, NV: A two-year conditional grant of $50,000 for its Regrant Project, which seeks to address the needs of local repositories of Nevada's documentary heritage.

New York State Historical Records Advisory Board, Albany, NY: $156,698 for its SHRAB Documentation Demonstration Project to test a practical approach to create topical documentation plans, engage records creators and users in the documentation process, take action to preserve the most important records, and raise public awareness of the value of an even and equitable historical record.

Vermont Secretary of State, Montpelier, VT: $74,074 for the Vermont SHRAB's Training for Awareness and Access to Historical Records Project to improve preservation of and access to Vermont's historical records.

Wisconsin State Historical Records Advisory Board, Madison, WI: $100,359 for its Archives Repositories Assessment and Mentoring Project to strengthen the board's partnerships with statewide associations of records creators, keepers, and users.

b. Completed Projects:

Florida State Historical Records Advisory Board, Tallahassee, FL: $25,000 for its Development and Training Regrant II Project, which seeks to provide education and training programs for archivists, records managers, and records custodians, and to support archives and records management programs leading to improved management of historical records.

Maine State Historical Records Advisory Board, Augusta, ME: $52,494 for its Preservation and Access Regrant Project, which seeks to improve preservation of and access to Maine's historical records.

South Carolina State Historical Records Advisory Board, Columbia, SC: $100,000 ($50,000 matching) to preserve and provide access to valuable historical materials in South Carolina's repositories of private papers and non-governmental archives. At least 90 percent of grant funds will be regranted.

Texas State Library and Archives Commission, Austin, TX: $49,835 to provide archival and records management training and program development assistance for records custodians throughout Texas. Ninety percent of grant funds will be regranted, with $20,000 allocated to the training component and $25,000 allocated to program development.

IV. State Board Collaborative Project Grants:

a. Active Projects:

American Association for State and Local History, Nashville, TN: $190,800 to work with the Council of State Historical Records Coordinators to develop a national conference on archival continuing education

that specifically addresses the needs of small historical records repositories, and to support the Council's work to identify and share best practices among state boards, state archives, and the professional organizations serving historical records repositories.

American Association for State and Local History, Nashville, TN: $183,072 to fund, in partnership with the Council of State Historical Records Coordinators, a National Forum on Archival Continuing Education to be held in April 2000, and to fund the Council's 2001 meeting, which will evaluate the Forum.

V. Founding-Era Documentary Editing Project Grants:

a. Active Projects:

Yale University, New Haven, CT: Grants of $152,570, $154,000, $154,000, and $154,000 to assist its work on a comprehensive book edition of *The Papers of Benjamin Franklin.*

Yale University Press, New Haven, CT: Grants totaling $30,000 to assist with the publication of *The Papers of Benjamin Franklin.*

Supreme Court Historical Society, Washington, DC: Grants of $175,155 , $205,740, $216,150, and $216,150 to edit a selective book edition of *The Documentary History of the Supreme Court, 1789-1800.*

The George Washington University, Washington, DC: Grants of 176,520, $190,500, $187,140, and $187,140 to continue editing *The Documentary History of the First Federal Congress, 1789-1791.*

Johns Hopkins University Press, Baltimore, MD: Grants totaling $16,512 to assist with the publication of *The Documentary History of the First Federal Congress of the United States of America, 1789 – 1791.*

Massachusetts Historical Society, Boston, MA: Grants of $121,750, $126,875, $140,832, and $140,832 to support the preparation of a comprehensive book edition of *The Adams Papers.*

Princeton University, Princeton, NJ: Grants of $140,346, $147,363, $154,731, and $154,731 to support its work on a comprehensive book edition of *The Papers of Thomas Jefferson.*

University of Virginia, Charlottesville, VA: Grants of $122,744, $132,500, $139,200, and $139,200 to continue work on a comprehensive book edition of *The Papers of James Madison.*

University Press of Virginia, Charlottesville, VA: Grants totaling $30,000 to assist with the publication of *The Papers of James Madison.*

University of Virginia, Charlottesville, VA: Grants of $132,454, $138,341, $143,661, and $143,661 to edit a comprehensive book edition of *The Papers of George Washington.*

University Press of Virginia, Charlottesville, VA: Grants totaling $137,049 to assist with the publication of *The Papers of George Washington.*

Board of Regents, University of Wisconsin, Madison, WI: Grants of $146,926, $153,000, $160,000, and $235,000 to continue editing a selective book edition of *The Documentary History of the Ratification of the Constitution*

State Historical Society of Wisconsin, Madison, WI: Grants totaling $26,000 to assist with the publication of *The Documentary History of the Ratification of the Constitution.*

b. Completed Projects:

None

VI. Non- Founding Era Documentary Editing Project Grants:

a. Active Projects:

University of Arizona, Arizona State Museum, Tucson, AZ: Grants of $38,954, $45,390 and $50,383 for *Documentary Relations of the Southwest: Civil/Military.*

University of Arizona Press, Tucson, AZ: $6,474 to assist with the publication of *The Empire of Sand: The Seri Indians and the Struggle for Spanish Sonora, 1645-1803.*

Regents of the University of California, Los Angeles, CA: Grants of $51,142, $55,233 and $58,272 for *The Marcus Garvey and the Universal Negro Improvement Association Papers.*

University of California Press, Los Angeles, CA: $10,000 to assist with the publication of *Marcus Garvey and the Universal Negro Improvement Association Papers*, Vol. 10.

Regents of the University of California, Berkeley, CA: Grants of $100,000, $100,000 and $100,000 for *The Papers of Emma Goldman.*

Stanford University, Stanford, CA: Grants of $57,789 and $64,146 for *The Papers of Martin Luther King, Jr.*

University of California Press, Berkeley and Los Angeles, CA: $10,000 to assist with the publication of *The Papers of Martin Luther King, Jr.*, Vol. 4.

Pomona College, Claremont, CA: Grants of $32,400, $34,992 and $18,182 for *The Letters of Lucretia Coffin Mott.*

Yale University Press, New Haven, CT: $6,000 to assist with the publication of *The Papers of Frederick Douglass*: Series Two, Vol. 1: *Narrative of the Life of Frederick Douglass.*

Yale University Press, New Have, CT: $10,000 to assist with the publication of *Selected Papers of Charles Willson Peale and His Family*, Vol. 5.

Howard University, Washington, DC: $75,000 for a project entitled African-American Historical Linkages with South Africa, ca. 1890-1965.

The Corcoran Gallery of Art, Washington, DC: $50,000 for *The Curator's Journals of William MacLeod.*

The American University, Washington, DC: Grants of $38,220, $41,278 and $45,819 for *The Papers of Frederick Law Olmsted.*

Martin Luther King, Jr., Center for Nonviolent Social Change, Inc., Atlanta, GA: $53,508 for continuing work on *The Papers of Martin Luther King, Jr.*

Morehouse College, Atlanta, GA: Grants of $56,700 and $62,937 for *The Howard Thurman Papers.*

University of Georgia Press, Athens, GA: $4,923 to assist with the publication of *John Franklin Jameson and the Development of Humanistic Scholarship in the United States*, Vol. 3.

Ulysses S. Grant Association, Carbondale, IL: Grants of $66,732, $72,071 and $77,432 for *The Papers of Ulysses S. Grant.*

Southern Illinois University Press, Carbondale, IL: Grants totaling $30,000 to assist with the publication of *The Papers of Ulysses S. Grant.*

University of Illinois Press, Urbana and Chicago, IL: Grant totaling $20,000 to assist with the publication of *The Samuel Gompers Papers.*

Illinois Historic Preservation Agency, Springfield, IL: Grants of $63,000, $88,040 and $75,524 for *The Lincoln Legal Papers: A Documentary History of the Law Practice of Abraham Lincoln, 1836-1861.*

Indiana University-Purdue University at Indianapolis, Indianapolis, IN: $18,141 for *The Papers of Frederick Douglass.*

Louisiana State University Press, Baton Rouge, LA: $10,000 to assist with the publication of *The Papers of Jefferson Davis*, Vol. 10.

The Johns Hopkins University Press, Baltimore, MD: $10,000 to assist with the publication of *The Papers of Thomas Edison*, Vol. 4.

The Johns Hopkins University, Baltimore, MD: Grants of $37,777, $40,799 and $45,287 for *The Papers of Dwight David Eisenhower.*

University of Maryland, College Park, MD: Grants of $95,189, $102,804 and $160,019 for *Freedom: A Documentary History of Emancipation, 1861-1867.*

University of Maryland, College Park, MD: Grants of $68,899, $72,510 and $80,000 for *The Samuel Gompers Papers.*

Duke University, Durham, NC: Grants of $51,979, $56,137 and $60,170 for *The Jane Addams Papers.*

University of North Carolina, Greensboro, NC: Grants of $23,167, $23,692 and $25,464 for *Race, Slavery, and Free Blacks: Petitions to Southern Legislatures and County Courts, 1776-1867.*

University of North Carolina Press, Chapel Hill, NC: $10,000 to assist with the publication of *The Papers of Nathanael Greene*, Vol. 10.

University of North Carolina Press, Chapel Hill, NC: Grant totaling $13,966 to assist with the publication of *The Papers of John Marshall.*

University of North Carolina Press, Chapel Hill, NC: Grants totaling $30,000 to assist with the publication of *The Papers of Charles Carroll of Carrollton*.

Rutgers, The State University of New Jersey, New Brunswick, NJ: Grants of $42,955, $46,391 and $51,493 for *The Papers of Thomas Edison*.

Rutgers, The State University of New Jersey, New Brunswick, NJ: Grants of $43,000, $43,000 and $43,000 for *The Papers of Elizabeth Cady Stanton and Susan B. Anthony*.

Rutgers University Press, New Brunswick, NJ: $10,000 to support the publication of *The Papers of Elizabeth Cady Stanton and Susan B. Antony*, Vol. 2.

The University of New Mexico, Albuquerque, NM: Grants of $45,148, $37,397 and $41,511 for *The Journals of don Diego de Vargas*.

University of New Mexico Press, Albuquerque, NM: Grants totaling $30,000 to assist with the publication of *The Journals of don Diego de Vargas*.

Cambridge University Press, New York, NY: $10,000 to assist with the publication of *Freedom: A Documentary History of Emancipation*, Series III, Vol. 1.

New York University, New York, NY: $182,738 for continuing work on *The Papers of Margaret Sanger*.

Colgate Rochester Divinity School/Bexley Hall/Crozer Theological Seminary, Rochester, NY: $52,500 to the *Howard Thurman Papers*.

Kent State University, Kent, OH: Grants of $38,244, $35,492 and $39,396 for *The Robert A. Taft Papers*.

Kent State University Press, Kent, OH: $15,109 to assist with the publication of *The Papers of Robert A. Taft*.

Indiana University of Pennsylvania, Indiana, PA: $10,513 for *The Papers of Joseph Trimble Rothrock, M.D.*

East Stroudsburg University, East Stroudsburg, PA: Grants of $26,250, $35,500 and $105,000 for *The Papers of the War Department, 1784-1800*.

Rhode Island Historical Society, Providence, RI: Grants of $70,229, $75,847 and $84,190 for *The Papers of General Nathanael Greene*.

University of South Carolina, Columbia, SC: Grants of $40,299, $47,103 and $49,149 for *The Papers of John C. Calhoun*.

University of South Carolina Press, Columbia, SC: Grants totaling $16,667 to assist with the publication of *The Papers of John C. Calhoun*.

University of South Carolina, Columbia, SC: Grants of $73,500, $76,692 and $75,524 for *The Papers of Henry Laurens*.

University of South Carolina Press, Columbia, SC: $10,000 to assist with the publication of *The Papers of Henry Laurens*, Vol. 15.

University of Tennessee, Knoxville, TN: Grants of $63,068, $68,113 and $75,605 for *The Papers of Andrew Jackson.*

University of Tennessee, Knoxville, TN: Grants of $73,573, $79,459 and $115,732 for *The Papers of Andrew Johnson.*

University of Tennessee, Knoxville, TN: Grants of $41,041, $43,094 and $47,834 for *Correspondence of James K. Polk.*

William Marsh Rice University, Houston, TX: Grants of $82,108, $72,437 and $80,405 for *The Papers of Jefferson Davis.*

The College of William and Mary, Williamsburg, VA: Grants of $14,332, $15,000 and $15,000 for *The Papers of Charles Carroll of Carrollton.*

George C. Marshall Foundation, Lexington, VA: Grants of $52,000, $52,000 and $57,000 for *The Papers of George Catlett Marshall.*

Institute of Early American History and Culture, Williamsburg, VA: Grants of $19,110, $20,639 and $22,909 for *The Papers of John Marshall.*

West Virginia University Research Corporation, Morgantown, WV: Grants of $15,052 and $16,343 for *The Papers of Frederick Douglass.*

b. Completed Projects:

The Claremont Graduate School, Claremont, CA: $7,750 to complete work on *The Salmon P. Chase Papers.*

University Press of New England, Andover, NH: Grants totaling $16,000 to assist with the publication of *The Correspondence of Ethan, Ira, and Levi Allen.*

Queens College and the Research Foundation of the City University of New York, New York, NY: Grants of $38,220 and $51,956 for *The Papers of Robert Morris.*

Kent State University Press, Kent, OH: $8,211 to assist with the publication of *The Salmon P. Chase Papers*, Vol. 5.

University of Pittsburgh Press, Pittsburgh, PA: $10,000 to assist with the publication of *The Papers of Thaddeus Stevens*, Vol. 2.

VII. Records Access Project Grants:

a. Active Projects:

University of Alaska Fairbanks, Fairbanks, AK: $30,346 for a project to undertake preservation of and provide access to the Fred Machetanz film collection, an important visual record of Alaska's territorial period.

The Connecticut Historical Society, Hartford, CT: $75,600 ($20,000 matching) for a project to process, catalog, and produce finding aids for 30 significant manuscript collections documenting the French and Indian War, the American Revolution, and the early national period through the Civil War.

The Catholic University of America, Washington, DC: $54,112 to arrange, describe, undertake conservation work on, and prepare guides for five collections which document the labor movement and religious activism in the New Deal era.

Evanston Historical Society, Evanston, IL: $45,000 ($15,000 matching) for a project to arrange, describe, and make available local government records, personal papers, and organization records documenting the city's history.

The Art Institute of Chicago, Chicago, IL: $37,500 to process the records of architect Bruce Goff (1904-1982).

Eastern Kentucky University, Richmond, KY: $32,623 for the Kentuckiana Project of the State-Assisted Academic Library Council of Kentucky, to undertake planning and training in preparation for the creation of Kentucky's Commonwealth Virtual Library.

Maine Historical Society, Portland, ME: $82,536 for a project to gain physical and intellectual control over three collections of architectural records.

Southwest Missouri State University, Springfield, MO: $58,620 for a project to arrange and describe 18 of the most important collections from its Ozark Labor Union Archives (OLUA).

William Woods University, Fulton, MO: $4,610 for an archival consultancy to help the University, Westminster College, and the Winston Churchill Memorial and Library develop plans to manage historically significant materials and to establish archival and records management programs.

University of North Carolina at Chapel Hill, Chapel Hill, NC: $91,425 for a project to arrange and describe the University's African-American archival and manuscript holdings and those of North Carolina Central University.

New Jersey Historical Society, Newark, NJ: $188,220 to arrange, describe, and catalog 435 manuscript collections documenting the state's economic and social transformation, 1750-1860.

Princeton University, Princeton, NJ: $55,206 for an 18-month project to organize, describe, catalog, and provide more effective access to three major collections and seven smaller collections (comprising 631 linear feet) in its Seeley G. Mudd Library relating to Cold War era liberalism. The major collections include the Fund for the Republic Archives, Freedom House Archives, and the records of Franklin Book Programs, Inc.

Rutgers, The State University of New Jersey, New Brunswick, NJ: $73,546 for a project to arrange and describe the records of Frances R. Grant and Robert Alexander, two individuals involved in U.S. non-government organizations in Latin America.

Clerk's Office, County of Santa Fe, Santa Fe, NM: $9,157 to microfilm 73 deed books dating from the American occupation in 1847 to around 1893.

New York State Education Department, Albany, NY: $60,123 to the Department's State Archives and Records Administration for a project to carry out a comprehensive collection assessment.

New York University, New York, NY: $135,220 ($30,000 matching), to go to its Robert F. Wagner Labor Archives for the second phase of its "Ordinary People, Extraordinary Lives" Labor Records Project to locate, preserve, and make accessible records documenting the labor history of New York City.

New York City Department of Records and Information Services, New York, NY: $31,725 for a one-year project to transfer approximately two million feet of film created by WNYC (the city's municipal broadcast station) to videotape.

The Brooklyn Historical Society, Brooklyn, NY: $57,308 for a project to prepare more detailed descriptive information for five collections, create a trial finding aid for one of the collections using Encoded Archival Description, and develop a pilot curriculum package for high school students based on another of the collections.

Trustees of Columbia University in the City of New York, New York, NY: $43,308 for a project to rehouse and provide access to over 27,000 images in three collections and create descriptive tools.

The Dayton Art Institute, Dayton, OH: $30,940 for a project to establish an archival program.

Iowa Tribe of Oklahoma, Perkins, OK: $49,011 for a project to arrange and describe records relating to the Iowa Tribal Business Committee.

Pawnee Nation of Oklahoma, Pawnee, OK: $14,422 for a project to conduct a repository survey to identify photographs relating to the Pawnee Nation, obtain copies of appropriate photographs, and arrange and describe them for use at the nation's archival facility.

University of Pennsylvania, Philadelphia, PA: $55,675 for a project to arrange, describe, and make available the personal and professional papers of Elizabeth Robbins Pennell, Margaret Naumburg, and Wanda Gág.

The Historical Society of Pennsylvania, Philadelphia, PA: $77,873 for a project to arrange, describe, rehouse, and catalog the records of Coxe Mining Company, an independent coal producer that played a key role in the development of anthracite mining in the state.

University of South Carolina, Columbia, SC: $69,353 for an 18-month project to process 15 historically significant manuscript collections relating to the history of South Carolina and the South in the South Caroliniana Library, a special collections library of the university. The collections, with a total volume of 535 linear feet, cover topics in women's history, slavery and race relations, the Civil War, and political and military history.

Lincoln Memorial University, Abraham Lincoln Museum, Harrogate, TN: $30,000 for a one-year project to conduct a survey of the Abraham Lincoln Library and Museum's archival collection to identify the size and scope of its manuscript, photograph, scrapbook, and university archives components, and to arrange and describe the manuscript collection, to prepare catalog records of these collections, with further arrangement and description of the photographs, scrapbooks, and university archives in that priority order as time and resources allow.

University of Texas, San Antonio, San Antonio, TX: $79,373, to go to the Center for the Study of Women and Gender and the Special Collections and Archives Department for a project to arrange and describe manuscript materials that document the history of women and gender in South Texas, specifically women's voluntary organizations.

The African American Museum of Dallas, Dallas, TX: $24,507 ($10,000 matching) for a project to arrange, describe, and provide housing for five Dallas-area photographic and manuscript collections.

Fairbanks Museum and Planetarium, St. Johnsbury, VT: $143,191 for a project to arrange, describe, and catalog the documentary holdings of the Fairbanks Museum, the St. Johnsbury Athenaeum, the Town of St. Johnsbury, St. Johnsbury Academy, and St. Johnsbury Historical Society.

Eastern Washington State Historical Society, Spokane, WA: $87,084, to go to its Cheney Cowles Museum for a project to preserve and catalog nitrate and acetate negatives from more than 80 collections.

b. Completed Projects:

Mobile Municipal Archives, Mobile, AL: $7,600 for a project to revise the 1986 edition of the Guide to the Municipal Archives and to publish and distribute the revised edition.

Central Arkansas Library System, Little Rock, AR: $37,149 for a one-year project, in collaboration with the Aerospace Education Center, to arrange and describe a portion of the Jay Miller Aviation History Collection. The records will be processed, a printed finding aid prepared, and descriptions of the records entered into OCLC.

Regents of the University of California, Berkeley, CA: $121,815 for the first year of a two-year project to process a collection of more than 300,000 photographic negatives from the newspaper photo morgue of the *San Francisco News-Call-Bulletin*, 1916-1965, and to create finding aids for the collection using the Society of American Archivists' emerging standard for Encoded Archival Description (EAD).

Regents of the University of California, Berkeley, CA: $84,305 for the second year of the *San Francisco News-Call-Bulletin* Photographic Encoded Archival Description (EAD) Project at its Bancroft Library.

Denver Museum of Natural History, Denver, CO: $13,944 to preserve an historically important collection of Alaska ethnographic images dating from the 1920s.

Government of the District of Columbia, Washington, DC: $2,500 to hire a consultant to assist with the development of a plan for establishing an archival program within the Recorder of Deeds Division.

Atlanta Historical Society, Atlanta, GA: $33,331 for its project to arrange and describe three collections of historical photographs: images of African Americans, the Marion Johnson Collection, and cased images.

The Art Institute of Chicago, Chicago, IL: $40,000 for a 15-month project to process the architectural records of the Institute's David Adler Archive. A finding aid/study guide will be published, and record descriptions will be made available through RLIN.

The Art Institute of Chicago, Chicago, IL: $21,050 for a project to microfilm the papers of architect and city planner Edward H. Bennett, Sr.

Wichita Public Library, Wichita, KS: $2,040 for a six-month consultant project to develop a plan to preserve, describe, and provide access to 314 cubic feet of unprocessed archives and manuscripts relating to the history of Wichita and Sedgwick County.

Concord Free Public Library, Concord, MA: $7,547 for a 12-month project to provide access to and preserve 1,735 negatives (1870-1937) contained in five collections.

Northeastern University, Boston, MA: $155,372 for a project to identify, locate, and secure collections for four under-documented Boston communities—the African American, Chinese, lesbian and gay, and Puerto Rican—and to arrange and describe three major collections documenting organizations from three of these communities.

Maryland Historical Society, Baltimore, MD: $65,402 for a 17-month project to catalog two significant photograph collections relating to life in Baltimore from the 1940s to the 1970s.

University of Detroit Mercy, Detroit, MI: $5,840 for a project to plan for a digitized image database of Great Lakes ships based on the Father Edward J. Dowling Marine Historical Collection.

University of North Carolina at Pembroke, Pembroke, NC: $3,153 for a six-month project to hire a consultant to assist with the development of a plan for an archives and records management program for the university's records and for the records of the Lumbee Tribe.

Nebraska State Building Division, Lincoln, NE: $17,573 for an eight-month project to process and describe 4,860 drawings and blueprints documenting the construction of the state=s capitol.

City of Manchester, Manchester, NH: $35,489 for a one-year project to continue an archival project to process and rehouse over 150 years of municipal records dating from the mid-19th century.

New Jersey Historical Society, Newark, NJ: $41,322 for a one-year project to preserve, arrange, describe, and publicize 60 collections relating to the history of health care in New Jersey. The collections, comprising approximately 160 feet of records, cover a time span of more than 250 years dating from the mid-18th century.

The Brooklyn Historical Society, Brooklyn, NY: $65,000 for an 18-month project to provide enhanced access to 1,076 linear feet of the society's holdings. Project staff will arrange and describe those records which have not previously been processed and prepare collection data forms or other finding aids for those records which have been arranged but only inadequately described. MARC AMC records will then be created and made available through RLIN and OCLC.

The Chickasaw Nation, Ada, OK: $5,000 for a project to develop a plan for a tribal archives program to supplement its current records management program.

Pawnee Tribe of Oklahoma, Pawnee, OK: $65,000 for a project to develop a records management program and to process tribal records.

Rhode Island School of Design, Providence, RI: $109,541 for a two-year project to establish an archives and records management program for the school's records.

Documentary Arts, Inc., Dallas, TX: $31,241 to establish a regional archivist program involving four Dallas-area institutions—DAI, the African American Museum, Jarvis Christian College, and Wiley College.

National Association of Alcoholism and Drug Abuse Counselors, Arlington, VA: $4,500 to engage the services of a consultant for assistance with the development of an archives and records management program.

National Association of Alcoholism and Drug Abuse Counselors Education and Research Foundation, Arlington, VA: $15,650 for a project to develop an archives and records management program.

The Museum of Flight, Seattle, WA: $13,076 for a project to preserve and make available a collection of Douglas Aircraft Company drawings that date from the company's founding.

Museum of History and Industry, Seattle, WA: $61,580 for a two-year project to survey the images comprising the Seattle *Post-Intelligencer* collection (ca. 293,000 negatives; 1924-1972).

VIII. Educational Program Grants:

a. Active Projects:

Fort Lewis College, Durango, CO: $43,500 to its Center of Southwest Studies for a fellowship in archival administration.

Janet F. Davidson, Newark, DE: $41,250 for a fellowship in historical editing at the Samuel Gompers Papers.

University of Maryland, College Park, MD: $1,000 to the Samuel Gompers Papers Project for costs of selecting an Editing Fellow.

Duke University, Durham, NC: $43,500 to its Rare Book, Manuscript, and Special Collections Library for a fellowship in archival administration.

Rutgers, the State University of New Jersey, New Brunswick, NJ: $1,000 to the Papers of Elizabeth Cady Stanton and Susan B. Anthony Project for costs of selecting an Editing Fellow.

New York University, New York, NY: $42,250 for *The Margaret Sanger Papers* for costs of selecting and stipend for an Editing Fellow.

University of Virginia, Charlottesville, VA: $43,500 to the Special Collections Department of the University of Virginia Library for a fellowship in archival administration.

Wisconsin History Foundation, Inc., Madison, WI: $28,626 to support the 29th Institute for the Editing of Historical Documents.

b. Completed Projects:

Pomona College, Claremont, CA: $1,000, to the Letters of Lucretia Coffin Mott Project for costs of selecting an Editing Fellow.

Carol Faulkner, Claremont, CA: $41,250 at the Letters of Lucretia Mott Project.

Princeton University, Princeton, NJ: $43,500 to the Seeley G. Mudd Manuscript Library for a fellowship in archival administration.

Association for Documentary Editing, VA: $58,832 to plan and conduct two seminars in electronic publishing.

Wisconsin History Foundation, Inc., Madison, WI: $21,969 to support the 26th Institute for the Editing of Historical Documents.

Wisconsin History Foundation, Inc., Madison, WI: $22,995 to support the 27th Institute for the Editing of Historical Documents.

Wisconsin History Foundation, Inc., Madison, WI: $23,200 to support the 28th Institute for the Editing of Historical Documents.

Sean Patrick Adams (Ph.D. candidate, University of Wisconsin), Madison, WI: $41,250 for a fellowship in historical editing at the Frederick Douglass Papers, West Virginia University, Morgantown.

Papers of Frederick Douglass, West Virginia University Research Corporation, Morgantown, WV: $1,000 for travel funds for its fellowship in historical editing.

IX. Endorsed Projects:

The Commission endorsed The George Washington University's project to collect and edit the papers of Eleanor Roosevelt.

X. Congressionally Directed Grants:

Alaska Department of Education, Division of Libraries, Archives, and Museums, Juneau, AK: $97,901 for its project entitled Rich Mining: Documents from Alaska's Gold Rush Era.

The Center for Jewish History, New York, NY: $199,900 for a collaborative planning project to develop a management and operational plan for the Center that maximizes public services and the preservation of collections, and to develop a detailed plan for the Center's Integrated Collections Access and Management System.

Mr. HORN. Could you tell me what partnerships, if any, the Archives has developed with the Library of Congress? Is there a duplication of effort here?

Mr. CARLIN. We have no official partnership. We have many unofficial ones. Dr. Billington and I work very closely together and communicate as much as our separate agendas and challenges allow. We both recognize that in a previous time there was some overlapping activity. As you are well aware, the Library has a much longer history. The Archives did not come into play until the mid-1930's. So it is understandable from earlier donated papers that the Library would have some records that if we had been in existence from day one would have come to the National Archives.

We really have two very separate distinguishable missions. We deal with records and they deal with manuscripts, use of records, what has been done with them, personal donations, et cetera, a broader role they have extended to the world. We are limited and focused on Federal records, U.S. Federal records. Dr. Billington and I have discussed the possibility, if our schedules ever allow, sitting down and talking about some of the records and some of the nonrecords that need to be shifted back and forth for a more appropriate placing.

I do not see any duplication in terms of our day-to-day actions.

Mr. HORN. As I understand the National Technical Information System at the Department of Commerce was closed down and the documents of that department went to the Library of Congress. As part of a Federal agency, wouldn't it be more appropriate to go to the National Archives to receive those documents?

Mr. CARLIN. First of all, for the record, the Department has recommended closing down NTIS. It is still dependent upon action of Congress. My staff communicate to me that action is unlikely this year. Our interest is in the records of that entity. I have discussed personally with both the Secretary of Commerce and Dr. Billington and we have universal agreement that the Federal Records Law will apply to NTIS, that those that are scheduled permanent will come to the National Archives and that the function—if the idea that has been put on the table is carried out—would be one of distribution for the Library of Congress.

Mr. HORN. Has the Archives recommended improvements for the Presidential Records Act? Is there a need for that?

Mr. CARLIN. I have under review a recommendation for the Presidential facilities. There is the Presidential Records Act and then one that deals with the facilities, the actual libraries that gets into the endowment area. I do have under review some ideas for change that at the appropriate time I would welcome the opportunity to discuss them with you.

Mr. HORN. We would welcome that because I think the Presidential libraries are a great institution. I know some want to have everything deposited in Washington, but I do not. I don't think you understand President Eisenhower unless you go to Abilene. I think it is good to go to the Carter Library. I have enjoyed the Lyndon Johnson Library, pharaoh-like though it is. I have found the people very helpful in these libraries on various types of research.

Mr. CARLIN. Mr. Chairman, in regard to your comment about Austin, changes have been made since then, as you are well aware

of, and you have been a part of making those changes. We have worked very hard as an agency to develop better facilities standards so that the facilities that are built are efficient and right for the Federal Government to accept. So some of the problems that have occurred—through no fault of anyone, necessarily, but just because of a lack of experience and guidance—I think we are working to correct those. I want to explore further ways we can develop that system so that—I agree with you that it is an excellent system and I want to do everything that I can to assure that it continues appropriately.

Mr. HORN. Now on the renovation of the National Archives building, the main one downtown, and the reencasement of the Charters of Freedom. What is the time schedule for renovation of the building and the reencasement of the Charters of Freedom?

Mr. CARLIN. We had resources from the Congress as well as a foundation grant to do work on the reencasement in fiscal year 1999 and have made a lot of progress. Adrienne Thomas can comment in much more depth.

We also had in fiscal year 1999 the money to do the design concept for the renovation of our main building downtown. Currently, in our 2000 budget that has been signed by the President, we have the resources to take what we call the pre-construction steps—final design as well as some initial physical work on the facility to build some office, what we call swing-space—so that we can do the renovation and keep the main functions of the building open during the 2-year renovation. We will be ready to start that in February of next year. It is our goal, if continued support from the administration and Congress comes for final renovation, that we would begin the renovation in February 2001.

Adrienne, do you have anything else you would like to add?

Ms. THOMAS. I just would say that the rotunda part of the building, where the charters are displayed, will have to close to the public for some period of time because we are going to be doing some major work in that area. But the rest of the building, in terms of research and so forth, will be open. The closing of the rotunda does not happen until July 2001. Then we hope to reopen approximately 2 years later. Actually, we are looking at Constitution Day as an appropriate time for reopening.

Mr. HORN. Everything around here takes 2 years. I noticed the east steps of the House could be done in 2 months, not 2 years. The lady that sits on top of the dome took 2 years. And so it goes.

Is there a magic number there?

Ms. THOMAS. I think there must be.

Mr. HORN. Is there any way that the Constitution, the Declaration of Independence, and the Bill of Rights could be put somewhere in the Archives?

Ms. THOMAS. There is some work to be done on the charters. They have been on display since 1952, since they were moved from the Library of Congress to the National Archives. We began the encasement project because the glass of the cases was deteriorating and we were concerned about that impact on the documents, since the documents rest directly against the glass. We were concerned about whether or not the seals on the cases have been maintained

for that period of time, or whether the original helium gas that had been inserted into the cases had leaked out. We weren't sure.

Part of the process will be not only to build new state-of-the-art encasements for the charters, but also for our very talented conservator staff to take the documents out of the old cases, take them off display, and do a careful assessment of what possible conservation methods might need to be applied to the documents.

So there is a period of time where they are off display when we are working on them and the conservators are looking at them.

Mr. HORN. On that point, is there a set time in the future—let's say 100 years from now—that all of that ink would fade no matter what you do? How assured are you that it will not fade?

Ms. THOMAS. Hundreds of years? I don't know.

Mr. CARLIN. They will be there 100 years from now. But if you start talking 1,000 years, as my Deputy has reminded me from time to time, eventually everything will disintegrate, regardless what you do.

Ms. THOMAS. But we are taking all sorts of steps in terms of UV filtration and protection of the documents.

Mr. HORN. What are the new techniques? Would you put helium back into the case?

Ms. THOMAS. Actually, we are going to use argon, which is another inert gas but has larger molecules, so it is more difficult for it to leak out if there is any possible leakage.

Mr. HORN. Has somebody tried that with existing documents that are not the Constitution?

Ms. THOMAS. Yes.

Mr. HORN. And there has been no damage in the changeover?

Ms. THOMAS. No, none at all.

Mr. CARLIN. There is the signature page that we have had a chance to work with. There is the one page that has never been displayed, the transmittal page, which is the same age, same paper, same everything. It will be the one that we will try first in the new encasements.

Ms. THOMAS. As a matter of fact, the conservators are today taking the transmittal page out of the old encasement and will start their process of reviewing the document and determining whether anything needs to be done. The first prototype casement is supposed to be delivered in December. So probably by the end of January the transmittal page will be placed in its new encasement. For the next 6 to 8 months after that, they are going to observe the transmittal page as a test case.

Mr. HORN. What does the transmittal page say? "Dear Continental Congress, John Adams, change some of my words", or what?

Ms. THOMAS. No, it is "Here delivered is the Constitution of the United States, signed George Washington." It is not much more than that.

Mr. CARLIN. It has George Washington's signature in terms of value. But it does give us something to work with that will be incredibly valuable long-term in terms of the meat of the subject matter.

Mr. HORN. So the Declaration of Independence does not have a transmittal page?

Ms. THOMAS. No.

Mr. HORN. That is what I thought you were talking about.

Mr. CARLIN. No, it was the transmittal page for the Constitution.

Mr. HORN. Well, it is interesting. So you are saying we have a refurbished view of that in 2002.

Ms. THOMAS. Yes.

Mr. HORN. Now on the money, what do you use the private money for and what do you use the governmental Federal money for?

Mr. CARLIN. What we have basically done with the Federal money is the basic things that you would have to do to renovate a building. We are not using private money to do any of the mechanical work, handicapped access, et cetera. We are using the private money to enhance the experience of those who use the building, generally, under an educational-type direction. The one exception that fits there is the murals that are in the rotunda. There is no Federal money to take care of the murals. We will raise private money to take care of them. They are badly in need of a lot of work. In fact, the latest estimate could be as high as $3 million just to work on the murals.

We would like to build a permanent exhibit that would put context to those documents, to make the experience more than a religious one for those who visit the rotunda. We will do that with private money, paralleling the division of labor we have with the Presidential Library System where permanent exhibits are filled with private money. Generally, we are using the private money to enhance the experience to make it more valuable, to complement the tremendous support from the Congress and the administration to do all the fundamentals, the basics.

Mr. HORN. How much has the PEW Foundation spent on this?

Mr. CARLIN. They gave us $800,000. The Congress appropriated $4 million. Those two sums take us well into and beyond the initial reencasement work.

Mr. HORN. That is great. PEW is a wonderful foundation. They have done so many constructive things in the last 5 years that relate to government. I am very impressed by them.

Mr. CARLIN. I certainly concur.

Mr. HORN. Let me move now to the revolving fund and then we will move to the next panel.

I guess when you look at the reimbursable revolving fund—do you think that will mean you have lost significant amounts of business from the agencies when they do not want to participate in the revolving fund? How does that work?

Mr. CARLIN. The way it will work is the agencies will make a choice as to whether they want to continue to do business with us, or in some cases we have an example or two that has been in the private sector that is now going to switch to us. But the standards and the processes will be the same. The agency will have to certify that their records—if they choose their own facility or a private vendor—that they meet the standards we have established, that we will be meeting and will be taking care of their records based on those standards.

We think also that, because they will be paying for a service—the Federal Government for the first time—they will look at the records in a little bit different fashion. In fact, we will actually

learn more about the records, establish a much more in depth relationship with the agencies, and from a cost-efficiency perspective, may together agree that some schedules on temporary records are too long, that the retention period should be shortened.

This obviously would be done with public comment and careful analysis, but I am quite sure we will find examples where 30-year temporary records—it could be 20 years—saving a considerable amount of resources in the process.

I think on balance we will have a much more positive, productive relationship as it relates to records because we will have—in an indirect way—raised the value of records and their importance.

Mr. HORN. Well, if they are going to go the private facilities route, will anybody from the Archives check on it to see that it meets your standards?

Mr. CARLIN. The system is set up, putting the burden on the agency, to certify us that if they choose to go to a private vendor that that private vendor is meeting the same standards that would be in a Federal records center. Obviously, if someone raises an issue, question, or concern, we will check into it. We felt it was the more efficient route, initially, to put the burden on the Federal agencies.

Mr. Chairman, as I have shared with you, one of the big differences we are finding in terms of standards deals with fire and the standards that apply to protect us from loss.

Mr. HORN. That is what I am thinking of, the Santa Barbara Museum, when it was rebuilt, has a marvelous system to prevent any damage to the paintings by foam and so forth.

Does the Archives have that now?

Mr. CARLIN. Yes. Tragically, we learned it the hard way. I guess it would be fair to say that we did not learn it in 1921 when we lost the 1890 census. But the fire, where we lost the top floor of military personnel records in Saint Louis—after that we developed standards which focused on not just the facility, but the contents, to limit the loss. We cannot magically eliminate fires, but when the standards focus as well on content, then you can reduce—our standard is to limit the loss to 300 cubic feet. That is a big difference when you think that many facilities might have 50,000, 100,000, 200,000, or 400,000 cubic feet of records. If the standards are focused on the facility, the contents will be likely lost.

We are finding that is a significant difference between us and the private sector, although not exclusively. We are finding that the private sector, in many cases, with the support of their clients, are not as concerned about the contents as we are as the responsible agency for protecting the records of the Federal Government.

Mr. HORN. I am glad you mentioned the Saint Louis situation. Almost every day in our district office, we have 600 cases at any point in time and 10 might clear today and 10 more come in. A lot of it is based on not finding the records of the military in the Saint Louis fire.

Mr. CARLIN. We have made some progress in reconstructing records, but obviously it was a tragedy that we will pay a price for forever.

Mr. HORN. Is there anything else you can do to make sure of the preservation of records?

Was that an internal combustion fire at Saint Louis? Man-made? Or what?

Mr. CARLIN. I do not know if we know exactly. We definitely know the facility was not designed to put the fire out. The only thing that kept it from being even more of a serious tragedy is that it was a well-constructed building so that the fifth floor down was able to hold all the water that was being put up there and not simply collapse the building—which would have taken all the records.

Ms. THOMAS. But it had no sprinkler system.

Mr. HORN. No foam?

Ms. THOMAS. Nothing like that. No fire suppression system.

Mr. HORN. I thank you. And if you can stay a little while longer, I would like you to participate, perhaps in panel two.

Mr. CARLIN. We will stay, Mr. Chairman. I would just say in closing, thank you very much. You, your colleagues, Congressman Turner, staff—you are most welcome to visit anytime. I issue a specific invitation, as we go through the reencasement—if you would like to view or see directly what new technology is coming, let us know and we will set it up.

Mr. HORN. One more question comes to mind, which is the Ellis Island situation, where they are going to put on the records of immigrants that came here and there will be computer access. Is the Archives involved in that at all? Or is that strictly Immigration?

Mr. CARLIN. We are involved. I cannot recall exactly, but there have been several projects—at least a couple of major projects—up there that have competed and now it has been sorted out. Particularly our regional office is connected in terms of how that all is going to work out because we have—of course, one of our most useful and valuable records are our Immigration and Naturalization records.

Mr. HORN. Right, and your shipping records.

Mr. CARLIN. Yes.

Mr. HORN. Well, let's call panel two forward. That's Mr. Nye Stevens, the Director of Federal Management and Work Force Issues, U.S. General Accounting Office; Page Putnam Miller, executive director, National Committee for the Promotion of History, representing the Organization of American Historians; Stanley Katz, vice president for research, American Historical Association; and H. Thomas Hickerson, associate university librarian for information technology, Cornell University, and president, Society of American Archivists.

Please come forward and raise your right hands.

[Witnesses sworn.]

Mr. HORN. Were there any subordinates behind you who were going to speak, too?

All four of the new witnesses have taken the oath.

Mr. Stevens, we always respect the GAO reports, so if you can summarize that for us, we would be grateful.

STATEMENTS OF L. NYE STEVENS, DIRECTOR, FEDERAL MANAGEMENT AND WORKFORCE ISSUES, U.S. GENERAL ACCOUNTING OFFICE; PAGE PUTNAM MILLER, EXECUTIVE DIRECTOR, NATIONAL COMMITTEE FOR THE PROMOTION OF HISTORY, REPRESENTING THE ORGANIZATION OF AMERICAN HISTORIANS; STANLEY KATZ, VICE PRESIDENT FOR RESEARCH, AMERICAN HISTORICAL ASSOCIATION; AND H. THOMAS HICKERSON, ASSOCIATE UNIVERSITY LIBRARIAN FOR INFORMATION TECHNOLOGY, CORNELL UNIVERSITY, AND PRESIDENT, SOCIETY OF AMERICAN ARCHIVISTS

Mr. STEVENS. Yes, sir, Mr. Chairman. I will be very brief.

As you know, we have done a report on National Archives: The Challenge of Electronic Records Management, sometimes referred to as ERM. Our report shows that the Archives and the Federal agencies face five general challenges in managing their records in an electronic format. The first is just the sheer volume of these records. Some agencies, by themselves are generating each year 10 times as much e-mail as the total amount of electronic data files that were sent to NARA over the past quarter of a century.

The second challenge we think is definitional. Just what constitutes an electronic record? The old definition of a record was complicated enough, even when it presumed a permanent format. Distinguishing and separating material with permanent value from the temporary and ephemeral raises a plethora of questions.

The third challenge is because agencies follow no uniform hardware or software standards, NARA has to be capable of accepting a wide variety of formats from the agencies, and it has to have the capability of reading those records in a wide variety of formats.

Preserving long-term access to these records is the fourth challenge, and perhaps the most difficult. The average life of a typical software product is about 2 to 5 years. NARA needs to be able to preserve the records and notably the capability of reading them long after the hardware and the software on which they are based is obsolete.

Then finally, since NARA shares responsibility for records management with Federal agencies, developing and disseminating guidance to agencies is another long-term challenge for NARA. The existing guidance simply has not yet caught up with the universal deployment of personal computers. There used to be thousands of file clerks in the Government whose job was to identify, classify, and preserve records. Today, that duty is much more disbursed and individual professionals with PCs are the front-line of records management, and they need guidance in how to carry out those duties and responsibilities.

No one really knows the state of the agencies' adaptation to the needs of managing their records in an electronic environment. Our limited work at a few of them show that some agencies are waiting for more specific guidance from NARA and others are moving forward on their own. The Defense Department has perhaps done the most. NARA has endorsed the DOD software standard as a tool that other agencies can use as a model until the final policy is developed by NARA.

In doing our work, we were struck by the absence of Government-wide information on the records management capabilities and

programs of Federal agencies outside the NARA orbit—this is the issue that you have alluded to—because NARA had intended to do a baseline assessment survey to collect this kind of data on all agencies by the end of this fiscal year and the information was to be collected on the infrastructure of the records management activity, on internal guidance, on training, on implementation of the schedule process—a number of areas.

However, as you know, NARA has decided to postpone this effort to concentrate on the business process reengineering—the BPR you have talked about. We believe that the information they would get from this baseline survey would really be a necessary ingredient to doing the BPR in as sophisticated and comprehensive a way as it needs to be done. We think that conducting the survey now could provide valuable input to the business process reengineering itself. It could help fulfill one of NARA's own strategic goals to stay abreast of the technologies in the agencies. And it would put NARA and the rest of the Government in a better position in later years to assess the results of the business process reengineering and to put the agencies themselves as—we simply just don't know yet right now what other agencies are doing.

I would just like to conclude, Mr. Chairman, with a single observation that your initiative in holding this hearing is welcome and is far-sighted. Since NARA became an independent agency in 1985, neither Congress, nor the President, nor OMB, nor GAO for that matter, has placed a high priority on oversight of NARA's functions. The challenges I just mentioned in preserving our documentary heritage for the use of future generations really are profound and Congress is going to have to be a part of any solution to them.

I conclude and will respond to any questions you may have.

[The prepared statement of Mr. Stevens follows:]

United States General Accounting Office

GAO

Testimony

Before the Subcommittee on Government Management, Information, and Technology
Committee on Government Reform
House of Representatives

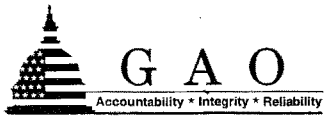
For Release on Delivery
10:00 a.m. EDT
on Wednesday
October 20, 1999

NATIONAL ARCHIVES

The Challenge of Electronic Records Management

Statement of L. Nye Stevens
Director, Federal Management and Workforce Issues
General Government Division





GAO/T-GGD-00-24

Statement

National Archives: The Challenge of Electronic Records Management

Mr. Chairman and Members of the Subcommittee:

I am pleased to be here today to discuss the challenges that face the National Archives and Records Administration (NARA) and federal agencies in their efforts to manage the rapidly increasing volume of electronic records. Records generated electronically, such as electronic mail (E-mail) messages, word processing documents, CD ROMs, and World Wide Web site pages, present special archival challenges for NARA and the agencies because these technologies are new and constantly changing. Consistent, sustained oversight from Congress – through avenues such as today's hearing – is needed to ensure that records management policies and practices keep pace with today's environment.

My testimony today centers on our report to the Senate Governmental Affairs Committee in July 1999.[1] In that report, we noted that NARA and the agencies must address several hardware and software issues to ensure that electronic records are properly created, permanently maintained, secured, and retrievable in the future. Also, because of the wide variance in electronic records management (ERM) policies and practices at four agencies we visited, we recommended that NARA conduct a baseline survey of all agencies as a part of its planned business process reengineering (BPR) effort. NARA had earlier planned to do such a survey but has decided to postpone it because the Archivist gave higher priority to such activities as BPR. Instead, NARA plans to collect information from a small, judgmentally selected sample of agencies. We continue to believe NARA's BPR effort would benefit from a complete baseline assessment survey of all agencies' records management capabilities.

NARA has taken actions to address the agencies' immediate needs for ERM guidance and direction – revising its bulletins and other guidance as well as forming a new group to help answer agencies' questions on ERM issues. Some of NARA's actions have been taken as a result of a court decision,[2] which held that NARA's guidance for the deletion of electronic records exceeded statutory authority. The Archivist appealed and on August 6, 1999 the U.S. Court of Appeals reversed the lower court's decision.[3] The Archivist said, however, that NARA would continue to work toward ensuring preservation and ready access to electronic records.

[1] National Archives: Preserving Electronic Records in an Era of Rapidly Changing Technology (GAO-GGD-99-94, July 19, 1999).

[2] Public Citizen v. Carlin, 2 F. Supp. 2d 1 (D.D.C. 1997).

[3] Public Citizen v. Carlin, 184 F.3d 900 (D.C. Cir. 1999).

Background

NARA is the successor agency to the National Archives Establishment, which was created in 1934, then incorporated into the General Services Administration in 1949 and renamed the National Archives and Records Service. NARA became an independent executive branch agency in 1985 in a move designed to give the Archivist greater autonomy to focus resources on the primary mission of preserving the country's documentary heritage.

NARA's mission is to make the permanently valuable records of the government – in all media – available to the public, the President, Congress, and the courts for reference and research. The Federal Records Act defines a record as all books, papers, maps, photographs, machine readable materials, or other documentary materials, regardless of physical form, made or received by an agency in connection with the transaction of public business as evidence of the organization, functions, policies, decisions, procedures, operations, or other activities of the government.[4] As a result, NARA preserves billions of pages of textual documents and numerous maps, photographs, videos, and computer records.

Under the Federal Records Act, both NARA and federal agencies have responsibilities for records management. NARA must provide guidance and assistance to federal agencies on the creation, maintenance, use, and disposition of government records.[5] Federal agencies are then responsible for ensuring that their records are created and preserved in accordance with the act. NARA and agency staff work together to identify and inventory an agency's records to appraise the value of the records and determine how long they should be kept and under what conditions.

NARA and Federal Agencies Face ERM Challenges

We found that NARA and federal agencies are confronted with many ERM challenges, particularly technological issues. NARA must be able to receive electronic records from agencies, store them, and retrieve them when needed. Agencies must be able to create electronic records, store them, properly dispose of them when appropriate, and send valuable electronic records to NARA for archival storage. All of this must be done in the context of the rapidly changing technological environment.

NARA officials told us that NARA needs to expand its capacity to accept the increasing volume of electronic records from agencies. Over the past quarter century, NARA received approximately 90,000 agency electronic

[4] 44 U.S.C. 3301.

[5] 44 U.S.C. 2904

data files. However, now NARA estimates that some federal agencies, such as the Department of State and Department of the Treasury, are individually generating 10 times that many electronic records annually just in E-mail – and many of those records may need to be preserved by NARA.

In addition to increasing volume, NARA must address some definitional problems, such as what constitutes an electronic record. In addition, because agencies follow no uniform hardware or software standards, NARA must be capable of accepting various formats from agencies and maintaining a continued capability of reading those records. The long-term preservation and retention of those electronic records is a challenge because of the difficulty in providing continued access to archived records over many generations of systems, because the average life of a typical software product is 2 to 5 years. NARA is also concerned about the authenticity and reliability of records transferred to NARA.

NARA is not alone in facing ERM challenges, the agencies also must meet Federal Records Act responsibilities. Records management is the initial responsibility of the staff member who creates the record, whether the record is paper or electronic. Preservation of and access to that record then also becomes the responsibility of agency managers and agency records officers.

Agencies must incorporate NARA's guidance into their own recordkeeping systems. Agencies' responsibilities are complicated by the decentralized nature of electronic records creation and control. For example, agencies' employees send huge volumes of E-mail, and any of those messages deemed to be an official record must be preserved. Agencies must assign records management responsibilities, control multiple versions, and archive the messages.

Agencies Vary in Their Implementation of ERM

Agencies' reactions to the challenges I just mentioned are varied. On the basis of our discussions with NARA and some agency officials, we learned that some agencies are waiting for more specific guidance from NARA while others are moving forward by looking for ways to better manage their electronic records. However, there has been no recent governmentwide survey to determine the extent of agencies' ERM programs and capabilities or their compliance with the Federal Records Act.

NARA officials consider the Department of Defense (DOD) as one of the agencies most advanced in its ERM efforts. NARA has worked with DOD

for several years to develop DOD's ERM software standard,[6] which is intended to help DOD employees determine what are records and how to properly preserve them. NARA endorsed the DOD standard in November 1998 as a tool that other agencies could use as a model until a final policy is issued by NARA. NARA, however, did not mandate that agencies use the DOD standard.

The DOD standard (1) sets forth baseline functional requirements for records management application software; (2) defines required system interfaces and search criteria; and (3) describes the minimum records management requirements that must be met, according to current NARA regulations. A number of companies have records management application products that have been certified by DOD for meeting this standard.

Other agencies have also been testing ERM software applications for their electronic records. For example, the National Aeronautics and Space Administration (NASA) and the Department of the Treasury's Office of Thrift Supervision (OTS) have both tested ERM software with mixed results.

NARA Does Not Have Governmentwide Data on Agencies' ERM Efforts

Even though NARA is aware of what some agencies are doing – such as DOD, NASA, OTS, and some others – it does not have governmentwide data on the records management capabilities and programs of federal agencies. NARA had planned to do a baseline assessment survey to collect such data on all agencies by the end of fiscal year 2000. The survey would have identified best practices at agencies and collected data on (1) program management and records management infrastructure, (2) guidance and training, (3) scheduling and implementation, and (4) electronic recordkeeping. NARA had planned to determine how well agencies were complying with requirements for retention, maintenance, disposal, retrieval/accessibility, and inventorying of electronic records. The Archivist decided, however, to temporarily postpone doing this baseline survey because he accorded higher priority to such activities as reengineering NARA's business processes. NARA's BPR will address its internal processes as well as guidance and interactions with agencies.

In our July 1999 report, we recommended that NARA do the baseline survey now, as part of its BPR, instead of waiting until BPR – which is

[6] The DOD standard, Design Criteria Standard for Electronic Records Management Software Applications, November 1997, was issued under the authority of DOD Directive 5015.2, Department of Defense Records Management Program, April 11, 1997.

scheduled to take 18 to 24 months – is completed. Conducting the baseline survey now could provide valuable information for the BPR effort while also accomplishing the survey's intended purpose of providing baseline data on where agencies are with regards to records management programs. NARA would also be in a better position in later years to assess the impacts of its BPR effort.

In response to our draft report and in a September 17, 1999, letter to the Comptroller General, the Archivist said that much of this baseline data would not be relevant to BPR and therefore NARA would not collect it at this time. However, NARA does have plans to collect limited information from a sample of agencies after starting BPR. We continue to believe that the baseline data is necessary to give NARA the proper starting point for proceeding with its BPR. Because agencies vary in their implementation of ERM programs, the baseline survey would provide much richer data than the limited information collection effort now planned by NARA.

NARA Is Revising Its ERM Guidance

Even though NARA lacks governmentwide data on how agencies are implementing ERM, NARA has already begun revising its guidance to agencies. Historically, NARA's ERM guidance has been geared toward mainframes and databases, not personal computers. NARA's electronic records guidance to agencies, which establishes the basic requirements for creation, maintenance, use, and disposition of electronic records, is found in the Code of Federal Regulations.[7]

In 1972, before the widespread use of personal computers in the government workplace, NARA issued guidance – General Records Schedule (GRS) 20 – on the preservation of electronic records. Several revisions occurred prior to a 1995 version which provided that after electronic records were placed in any recordkeeping system, the records could be deleted. In December 1996, a public interest group filed a complaint in federal district court challenging the 1995 guidance.

In an October 1997 decision, the court found that the Archivist had exceeded the scope of his statutory authority in promulgating GRS 20. The court said that GRS 20 did not differentiate between program records and administrative "housekeeping" records, and electronic records are distinct from printed versions of the same record. The court also said that the Archivist failed to carry out his statutory duty to evaluate the value of records for disposal, and GRS 20 violated the Records Disposal Act because it failed to specify a period of time for retention of records to be

[7] 36 C.F.R. Part 1234.

disposed of under a general schedule. Thus, the court ruled GRS 20 "null and void."

Following the court's ruling, NARA established an Electronic Records Working Group in March 1998 with a specific time frame to propose alternatives to GRS 20. In a subsequent ruling, the court ordered the NARA working group to have an implementation plan to the Archivist by September 30, 1998. In response to the working group's recommendations, NARA agreed in September 1998 to take several actions:

- It issued a revision in the general records schedules on December 21, 1998, to authorize agencies' disposal of certain administrative records (such as personnel, travel, and procurement) regardless of physical format, after creation of an official recordkeeping copy.
- It initiated a follow-on study group (made up of NARA staff, agency officials, and consultants) in January 1999 – Fast Track Development Project – intended to answer the immediate questions of agencies about ERM that can be solved relatively quickly.
- It issued NARA Bulletin 99-04 on March 25, 1999, to guide agencies on scheduling how long to keep electronic records of their program activities and certain administrative functions formerly covered under GRS 20.
- It drafted a new general records schedule for certain administrative records to document the management of information technology. NARA has received comments from agencies on the draft, and the draft is still under review by NARA and the Office of Management and Budget. NARA hopes to have this guidance issued by the end of 1999.

On August 6, 1999, the U.S. Court of Appeals reversed the lower court's decision and held that GRS 20 is valid. That reversal was not appealed by the public interest group. In response to the court of appeals decision, the Archivist said that NARA would continue in an orderly way to develop practical, workable strategies and methods for managing and preserving records in the electronic age and ensuring access to them. He said that NARA remains committed to working aggressively toward that goal.

ERM Activities in Some States and Foreign Countries Differ from Those of the Federal Government

Our review of the ERM activities in four states and three foreign governments showed that approaches to ERM differ. These entities often did things differently from each other and/or NARA.

In general, the four state archiving agencies (Florida, Oklahoma, Oregon, and Texas) provide centralized policies and procedures that are described in either state law or administrative rules. State archiving agencies that take physical custody of the actual records do so when the records are no

longer needed by the individual agencies but are of archival value. Two of the states also emphasized the use of the Internet as a mechanism that allows both the archivist and the general public to determine where records may be found. State officials indicated that state law and administrative rules that they issue guide their records management requirements, but they also interact with NARA and other states to assist in determining their states' policies.

Our review of public documents from three foreign governments (Australia, Canada, and the United Kingdom) showed that although these countries share common challenges, they each have taken somewhat different approaches to ERM decisions. For example, Australia has strong central authority and decentralized custody of records, and it maintains a governmentwide locator system. Canada issues "vision statements" rather than specific policies, and individual agencies maintain their own electronic records until they have no more operational need for them. The United Kingdom established broad guidelines, which are put into practice by its individual agencies in partnership arrangement with its national archives. Realizing the common problems faced by all countries, NARA is part of international initiatives that are to study and make recommendations regarding ERM.

Concluding Observations

In conclusion, it is obvious that NARA and federal agencies are being challenged to effectively and efficiently manage electronic records in an environment of rapidly changing technology and increasing volume of electronic records. It is certainly not an easy task. Much remains for NARA and the agencies to do as they tackle the issues I have discussed.

We believe that NARA is moving in the right direction. However, because of the variance of ERM programs and activities across the government, we continue to believe that the Archivist should conduct the baseline assessment survey as we recommended in our July 1999 report. This survey would produce valuable information for NARA's use during its critical BPR effort. A well-planned and successful BPR should be a stepping-stone for NARA as it moves into the next phase of its management of all records, particularly electronic.

As you know, Mr. Chairman, NARA has not had concerted congressional oversight as an independent agency. Such oversight is essential to help NARA ensure that the official records of our country are properly maintained and preserved. I commend the efforts of this Subcommittee for holding this hearing and bringing the issues surrounding government records into the spotlight. I look forward to future hearings in this area.

Mr. Chairman, this concludes my prepared statement. I would be pleased to respond to any questions you or other Members of the Subcommittee may have.

Contacts and Acknowledgement

For further information regarding this testimony, please contact L. Nye Stevens or Michael Jarvis at (202) 512-8676. Alan Stapleton, Warren Smith, and James Rebbe also made key contributions to this testimony.

Mr. HORN. We thank you very much on that.

We will hear from all the witnesses and then open it up to questions.

At this point, we will have our next presenter, which is Page Putnam Miller, the executive director, National Committee for the Promotion of History, representing the Organization of American Historians.

Ms. MILLER. Thank you very much, Representative Horn.

I have been following the National Archives for almost 20 years and have attended almost every hearing that has been held in Congress dealing with the Archives. I can attest that there have been no oversight hearings that are broadly geared to the operation of the Archives. There have been some hearings when there has been a fire, or when there have been questions about a particular program. We are so appreciative of your holding this hearing and of your commitment, as has previously been said, to giving attention to this very important agency.

I am representing today the Organization of American Historians, which is basically made up of history professors who teach at the college and university level. So I want to address my comments today to issues of research and to access of records. If records are not used, you wonder why they should be preserved and kept.

One of the keys to using records are good finding aids. To put this in perspective, if you put all the records for the National Archives for Archives I and II—not the Presidential libraries or the records center—on a shelf, that shelf would extend 650 miles. You can imagine how difficult it is for a researcher to know where to go to find records without good finding aids.

Our dream for the National Archives and part of the Archives' strategic plan—and you mentioned it earlier—is to have a series level description of all the holdings by 2007. A series is generally records that are similar in characteristic. For instance, it may be the correspondence of an Under Secretary for an office for a certain period of time. But you need some description of what is in this series. A series may be many, many boxes of records. So the series level description—which is sometimes called the reference quality description—is so important to us.

But at present about 30 percent of the holdings of the National Archives do not have a series level description. This is a backlog that has developed. It goes back to the 1950's and 1960's. There has been a long backlog of basic description. So when Archivist John Carlin was talking about populating the archival catalog, the on-line catalog, he is talking about entering the descriptions of these series of records.

Our concern is that you have a big enough problem in scanning in descriptions that are on paper to put into the computerized series, but what about the records for which no description has ever been written that is of research quality? The Archives has a locator file that provides very basic intellectual control of records, but this is not research quality.

So haveing good finding aids is one of our major concerns. It is our thought—and you began to get at this when you asked about requests from OMB—that the Archives has at present included in-

formation on 10 percent of the records into this computerized finding aid and to get to 100 percent in just 7 years, when you have a 30 percent backlog in basic description, there is going to need to be a real infusion of staff time. This is archival staff that have expertise in records that would be needed.

So we have concerns about the state of that finding aid. To have the finding aid on-line would mean that researchers across the country would know whether it is worth their while to make the trip to Washington. So that is so important.

Another aspect of access that I would like to mention is declassification. We are pleased that the Executive order has resulted in so many agencies declassifying records and transferring them to the National Archives. We know that in fiscal year 1997 there were 204 million records transferred. In fiscal year 1998 there were 193 million records. But when these records are declassified by an agency and sent to the National Archives, for a researcher to have access to them—and this is my issue, access to the records for researchers—the Archives has to process them. And to process them, they need to open each box, take out the record that still needs to be classified, put these in a secure area, put a marker in that file to show that a record has been removed, and then they need to prepare the description and develop the finding aid.

So as successful as the Executive order is in having records declassified and transferred, we as users will not have access to these until they are processed. The Archives has put in the strategic plan for the year 2000 processing 75 million records which is a significant amount. But in that pipeline there are 200 million records. So here again we are concerned about the backlog that will be building up. As agencies do their work on the Executive order there will be more required for the National Archives.

We love to hear these figures about agencies declassifying records, but we know that as researchers we still will not see those records until the Archives has been able to process them. And that is another very labor-intensive task that concerns us.

A final point I would like to make on access deals with the National Historical Publications and Records Commission. I am glad that you have been able to spend some time today talking about the NHPRC because that is the part of the National Archives that deals with non-Federal records. Certainly for historians, we are interested in Federal records, but also non-Federal records. The NHPRC has had a wonderful record over the years of leveraging private funds, 50 percent generally from private sources, and matching that and letting the donors of the private funds know that these are very good projects.

I would like to note that in 1976 the appropriation for NHPRC for grants was $4 million. That was a long time ago, over 20 years ago. Now they are up to $6 million. But this small agency that does this important work has really fallen so far behind from 1976 in being able to keep up with inflation and do the work. I would followup on the point that Archivist Carlin made regarding the grant applications.

NHPRC staff works very differently from the NEH staff on working with applicants. NHPRC's staff are very knowledgeable. They have specialists in different areas like electronic records and re-

search. In working with the applicants, if they know that according to their guidelines, and according to the amount of money there is, there is really no money for that project, they will convey that to the applicants. I do not think the number of applications is necessarily an indication of the appropriation level because we know from the state of State archives and the archives across the country that there is an enormous amount of work that needs to be done. We would like to encourage increased funding for NHPRC and a hard look at that small agency and what it is able to do.

In closing, I would just say that the access issues are very varied. It is not just the delivery of materials to researchers in the research room but the describing of records, the processing of records that have been declassified, and then through grants to NHPRC made available for research. So we are hopeful that the Archives can have some increased staff to deal with these very severe backlogs.

Thank you.

[The prepared statement of Ms. Miller follows:]

ORGANIZATION OF AMERICAN HISTORIANS
Office of the Executive Director
112 North Bryan Street • Bloomington, Indiana 47408-4199
Tel: 812-855-7311 • Fax: 812-855-0696
oah@oah.indiana.edu • http://www.indiana.edu/~oah

Testimony of
Page Putnam Miller
Testifying On Behalf
of the
Organization of American Historians
Before the
Subcommittee on Government Management, Information and Technology
of the Committee on Government Reform
of the U.S. House of Representatives
on October 20, 1999

I am Page Putnam Miller, the Director of the National Coordinating Committee for the Promotion of History, a consortium of 59 historical and archival organization. I am speaking today on behalf of the Organization of American Historians, one of the NCC organizations and the largest professional association in the country made up of historians who study the history of the United States. I have been attending Congressional hearings on the National Archives for almost twenty years, and this is the first oversight hearing, that I can recall, that isn't addressing an immediate crisis but that is dealings with a broad overview of the work of the agency. The historical profession is most appreciative of your holding this hearing.

The major constituency that I represent is college and university history professors. Thus, I will direct my remarks to the question of how well the National Archives is doing in making records accessible. In the final analysis, it is the use of records that makes archives valuable.

One of the most crucial elements in making records accessible are good finding aids. These finding aids are the keys to locating the records needed for a specific research project. To comprehend just how essential these finding aids are, it is important to remember that if all the records at the National Archives' two major research facilities in Washington -- Archives I and Archives II -- were placed on a shelf, the shelf would extend approximately 650 miles. The dream of the National Archives and of researchers is that one day finding aids that describe all records at the file series or collection level, will be available on the Internet.

To put the full text of 650 miles of records on the Internet is totally out of question. The National Archives currently estimates an average cost of $15 a page for digitizing records. At this rate, figuring 2,000 pages a foot, the cost of digitizing all of the records in Archives I and II would be $102 trillion dollars. Our dream, however, is not for the full text of all holdings to be on-line but for a comprehensive on-line catalog of the fining aids to help researchers discover whether records related to their research topic are available at the National Archives and whether they should plan a trip to Washington to spend time in the research rooms at Archives I and II..

The National Archives has stated a commitment to a comprehensive on-line catalog and a target for accomplishing this by 2007. But realistically, they are a long way from meeting this goal. Let me briefly review the situation. From the 1940s to the 1970s the National Archives developed paper finding aids at the series level. A series is a body of records that have similar characteristics and document the evolution of major policies and procedures, such as a the correspondence of a undersecretary heading up a specific office for a specific time period would be one file series. Sometimes a series is a vast collection of folders and boxes and thus without some description a researcher is unable the located the pertinent records. But in 1940s to 1070s while creating the paper finding aids, the National Archives developed a rather significant backlog of boxes of records that only had the most preliminary label and for which there was no series or collection description. This backlog amounted to approximately 25% of the National Archives' holdings. With the advent of computerized systems the National Archives began entering descriptions of new file series into an automated system but the backlog remained.

Now, the information from the paper finding aids from the 1940s to 70s, as well as the finding aids from the early automated system, need to be placed into the new on-line Archival Research Catalogue. But this involves not just the problem, which in itself is a significant one, of migrating old formats to a new format, but it involves doing basic, very labor intensive descriptions at the series or collection level of over 30% of the holdings for which reference quality description has never been prepared. This is a staggering backlog that requires intensive work by archival specialists of reviewing a file series and then preparing a summary description. Yet without this work, 30% of the records will have inadequate finding aids. If researchers do not have the tools to locate records, then those records cannot be used.

In 1999 the goal of the National Archives was to describe 10% of its holding in an on-line catalog and I understand they were successful in doing this. The goal for 2000 is to convert an additional 10% of the existing collection of series level descriptions into the on-line catalogue. While we do not minimize the achievements of these initial steps, our concern is how and when the National Archives is going to tackle the 30% of the records for which there are no series descriptions. Without an infusion of a special team devoted to this task, we do not see how the National Archives realistically can met the 2007 goal of having all of its holdings described as the series level in an on-line catalogue.

Declassification of records is another basic factor that affects researchers' access to records. Once an agency declassifies its records and transferred them to the National Archives, the National Archives must process them and describe them before they are available for researchers to use. Thus we applaud the fact that 204 million pages were declassified by federal agencies under Executive Order 12958 in FY 1997 and 193 million pages in FY1998. However, we should not ignore the increased work that this creates for the National Archives. The National Archives staff must pull out the records that agencies have marked that should remain classified. Staff pull the classified records, place them in a separate secure area, and put a notation in the declassified box that an item has been withdrawn. Then the Archives' staff must prepare finding aids – series level descriptions -- to assist researchers in using the records. The work of processing records is very

labor intensive.

The degree to which the Executive Order is successful in requiring agencies to review and declassify their records, then this creates significantly more work for the National Archives. There is currently a large backlog of records at the National Archives awaiting processing. To enable the National Archives to keep up with records being transferred under Executive Order 12958, the National Archives is going to need additional staff to deal with an extensive body of millions of pages of records that will need to be processed and described before researchers will have access to them.

A final point on access deals with the National Historical Publications and Records Commission. Created in 1934 as part of the National Archives, the NHPRC makes grants each year to institutions across the country to preserve historical records, publish historical papers, and make historical materials more accessible. NHPRC grants have an outstanding record of assisting in making non-federal records more accessible to researchers. The NHPRC requires matching funds from private sources and ensures potential backers that the projects are of genuine significance and capably staffed and organized. Through this model cost-sharing program, in which the average non-Federal contribution is almost 50%, NHPRC has efficiently used federal leverage to preserve our documentary heritage.

Much of the success of the NHPRC rests on its very able staff, who have expertise in various areas, such as electronic records and research issues, and are able to serve as a kind of clearing house of information for the archival community, creating a network of individuals and projects that can promote innovative pilot projects and recognize areas of unnecessary duplication.

Despite the outstanding work of NHPRC, its appropriation has remained at a pitifully low level. The appropriation for competitive NHPRC grants in FY 1 976 was 4 million and in FY2000 the amount is only $6 million. It is sometimes said that NHPRC doesn't get that many applications and thus doesn't need more grant money. However, NHPRC works with its grant applicants differently than NEH or many other grant giving agencies. NHPRC staff devotes considerable time in working with applicants at the front end of the application project to ensure exemplary submissions. The staff discouraged applications for projects for which they know funds would not be available. This has resulted in fewer but stronger applications. In the interest of making historical non-federal records accessible, it is time for a thorough review of the role and contributions of the NHPRC.

Making historical records accessible is just one of the tasks facing the National Archives, but for researchers' it is a most crucial one. I thank you for the opportunity today to discuss some of historian's concerns about policies that affect access to historical records.

Mr. HORN. Thank you. You have made some good suggestions.

We now have Dr. Stanley Katz, vice president for research, American Historical Association.

Mr. KATZ. Thank you very much, Mr. Chairman. It is a pleasure to be here. I can be very brief, I think.

I would also like to begin by thanking you and the subcommittee for undertaking these hearings. They are enormously important to all of us who are concerned about the National Archives. I would additionally like to thank Governor Carlin and his staff. They have an almost impossible task, a huge number of records, technological problems that now exist, declassification—it is a daunting challenge. Over the last few years, since Governor Carlin has been there, there have been noticeable improvements at the Archives and we are very grateful for that.

The one thing I wanted to address myself to is the question of the revolving fund, the reimbursable fund. Governor Carlin has spoken to that earlier and we think we do understand the general intention and value the intention of the Archives in this new project. We can understand why it comes about. It seems attractive as a way to relieve the budget of the National Archives. But we have concerns about whether it could really work in the way that the Archives hopes it will work.

The simple argument is that we are concerned whether it is consistent with what we take to be general inclination of human nature. We think that there will be a temptation on the part of agencies working within or without the rules to reduce the number of materials they actually have to pay for in order to store. It seems reasonable to expect that a rational actor would look for such strategies.

And while we do appreciate that there are going to be undertakings required by the agencies that they or private vendors will comply with NARA's standards, we are not sure that there is any adequate way of enforcing those guidelines. Indeed, we think that the problem of the Archives for a long time has been that Congress has never given it very effective enforcement mechanisms. This is another area that is not the fault of the Archives, but is the fault of the legal structure under which they work.

We value Governor Carlin's commitment to effective records management and to the maintenance of records storage standards. But it is this question of enforcement that we worry about. So we hope that in the quarterly reports you are requiring now some thought can be given to the kinds of information you could request that would enable both NARA and the oversight committee to make some judgments about what is actually going on.

For instance, it would be useful to have the estimates of both NARA and the agencies as to how many cubic feet of materials they actually have. It would be very good, from our point of view, to have the baseline study to know what is actually out there—or as nearly as possible what is out there.

I am sure there are other things. I am not an archivist myself. I am sure there is other technical information that could be provided and we hope that you would look into that. Our concern is that records be neither destroyed nor neglected for fear that agency budgets will suffer.

I would like to close by simply saying that I think there are some interesting examples out there of what has happened in other countries. I visited New Zealand 5 or 6 years ago. At the time they had privatized their government. I spent a day at their national archives. The archivist was very concerned—every agency was going on a pay-your-own-way basis—and she said, "We don't have much to sell." I think NARA is in that situation here.

I hope that in trying to make it possible for NARA to use the moneys it does have better, that we are not going to endanger Federal records.

Thank you very much.

[The prepared statement of Mr. Katz follows:]

ORGANIZED 1884 INCORPORATED BY THE CONGRESS 1889

American Historical Association

400 A STREET S.E. WASHINGTON, D.C. 20003 | 202-544-2422 | FAX 202-544-8307
AHA@THEAHA.ORG | HTTP://WWW.THEAHA.ORG

Testimony of
Stanley N. Katz, Vice-President for Research
of the American Historical Association
Before the
Subcommittee on Government Management, Information and Technology
of the Committee on Government Reform
of the U.S. House of Representatives
on October 20, 1999

I am Stanley Katz, the Vice-President for Research of the American Historical Association, the largest and oldest professional association of historians in the country. On behalf of the historical community, I thank you for inviting me to testify at this oversight hearing on the operation of the National Archives and Records Administration. Historians are greatly indebted to archival repositories for their work in identifying, preserving, and servicing the records on which much of our research depends.

Because the National Archives holds a treasure of records that document the history of our government and its various policies and programs, the health and welfare of this agency is of utmost importance to historians. I wish to direct my comments this morning toward concerns about the National Archives' new Federal Records Center Reimbursable Program and the related issue of the appraisal of records. Historians are well aware of the daunting challenges facing the National Archives as it tackles the task that is sometimes called "the taming of the paper and information jungle." We are also aware that by shifting to a reimbursable program, the National Archives is requiring the kind of payments for services that most agencies have already had in place for some time. While we do not seek to roll back the decision of the reimbursable program, we do wish to register some concerns so that possible pitfalls in the design and administration of this new program may be avoided.

Without having extensive knowledge of archival material or records management, but being familiar with the tendencies of human nature, it seems natural to think that some agencies that are faced with limited budgets and new storage fees, would try to reduce those fees by decreasing the numbers of records that will require storage. This tendency may be further exaggerated in agencies in which inadequate record keeping practices exist. Let me offer two examples that illustrate historians fears of how historically significant records can and are being lost.

The first example comes from a researcher who corresponded with the American Historical Association with concerns about Department of Education records. This researcher sought access to records that would assist in documenting success or failure of the Department of Education's International Education Programs. Some of these programs date back to the 1950s and were established under the National Defense Education Act. The researcher was specifically interested in the Undergraduate International Studies Program established in 1972. Because this

was a particularly successful program, an understanding of what contributed to the development of this program can be beneficial to educators today who are struggling with shrinking budgets and ever-present needs. However, this researcher was only able, during the past four years, to gain access to very limited records dealing with the Undergraduate International Studies Program. From correspondence with the National Archives, it appears that the Archives has retained no permanent records for such programs, nor does it have any appraisal schedules for the retention of records associated with the Undergraduate International Studies Program. Contact with the Department of Education indicates that temporary records for grant applications are retained for only three years after the duration of the grant, and the Department was unable to produce any records, such as copies of final reports that document the actual operation of these programs. One can only speculate that, over the years, with transitions in office space and staff, particularly with the need to squeeze more people into limited space, that many files drawers where emptied and files thrown out. It also appears that many staff at the Department of Education had very little direction as to what records should be preserved for archival purposes. The researcher was in fact told that all reports in the Undergraduate International Studies Program are destroyed three years after a grant is completed.

A second example deals with the destruction of policy records at the Internal Revenue Service. Shelley Davis, who was the Historian at the IRS from 1988 to 1995, tells of a number of different episodes -- of which she was personally aware -- in which important files were simply thrown out to make room for new files. In one case she had been asked by the executive who established the Taxpayer Advocate Office to write a brief history of that office. In researching this initiative, she contacted some early staffers on the project who had since retired. One retired staffer explained to Davis that she had been the unofficial "keeper of the records" and that she would be delighted to come back to the office and show her where the records were. When Davis and the retired employee arrived a the Taxpayer Advocate Office, they learned that the new office manager had just two days earlier ordered his employees to "clean this place up" and to "throw out all this old useless stuff." Thus the entire history of the IRS's effort to improve the ability of taxpayers to resolve issues was lost. Davis has also provided an account of the loss of the policy records that documented the history of the IRS's development and use of automation.

As these examples illustrate, there are serious records management problems at many agencies through which significant records that document important agency programs have not been appraised for permanent retention. The National Archives has noted in its reports that there is currently no baseline of information on agencies that indicate where agencies are deficient in performing records management and acknowledges that a current evaluation of records management programs exists for only a small portion of the Federal agencies. This means that the reimbursable program will be operating in an environment in which records, such as the ones described in the examples above, would continue to be thrown away. But the frightening possibility is that the reimbursable program will exacerbate the current inadequate management of public records by creating incentives for agencies systematically to purge their files.

Thus historians fear that while the reimbursable program is well meaning, and understandable in the light of budget pressures, that it will increase the likelihood that records that are not scheduled will be systematically destroyed to protect agency budgets. Realistically we know that most agencies are operating now under fiscal constraints and that every square foot of records

Mr. HORN. You are quite welcome.

We face a situation here where we have a 15-minute vote followed by a 5-minute vote. So before we hear Mr. Hickerson—it is going to take at least 20 minutes to 30 minutes—if you don't mind, we will try to reassemble here at 12:40 or so, which would give you a chance to eat a swift lunch in the gourmet Rayburn cafeteria, which is right below us on the basement floor.

I regret that we have several votes over there, so we must recess this now and be back at roughly 12:40, I think.

[Recess.]

Mr. HORN. We will hear Mr. Hickerson, then we will have a dialog.

Mr. HICKERSON. Thank you very much, Congressman Horn.

First I want to say what an honor it is for me to be able to participate in these hearings on the critical issues and the success of the National Archives and Records Administration.

While, as you have alluded to, in the United States the responsibility of maintaining the archival record is broadly distributed among State and municipal archives, university, corporate, and religious repositories, research libraries, and historical societies and museums, no institution other than the National Archives is so central and fundamental to the rights of every citizen and to the process of democratic governance. So it is a pleasure for me to be able to participate here.

My professional background includes 30 years of active involvement in archival practice as well as my extensive leadership in the archival profession, including my current services as president of the Society of American Archivists, and also my extensive service at Cornell University both in the area of archival and rare book and digital collection management and in information technology management generally. I am also here as a citizen of the United States.

I could say a great deal about the profession, but I will jump to those issues that you specifically asked me to address, which are electronic records and the application of new technologies.

I must start out by saying that I think Governor Carlin has done a great deal for the improvement of the National Archives' program during his time administering this program. I, however, am not quite as optimistic regarding the state of electronic records today. I think we do have a crisis. I refer to it as the Y2K that will not go away next year or the next or the next.

In 1990, the House Committee on Government Operations issued a report called "Taking a Byte Out of History: The Archival Preservation of Federal Computer Records". In that report, they outlined the many difficulties inherent in the selection, maintenance, and use of records in electronic form.

Unfortunately, while that report offered a very perceptive picture of the crisis of the moment, it was not an action-oriented document. No new research was funded. No new programs were put in place. So we do not yet have a scaleable working model of a system for realistically addressing these issues.

Although NARA has not solved this issue, there are a whole lot of us that have failed. First off, the technology industry has not helped us in this area. It has not been in their best interest to

stress the impermanence of digital records. So it is not surprising that they have not been out there on the front line. They periodically call attention to the media and the permanence of that media, but as Mr. Stevens alluded to, that is not the primary issue in being able to maintain access to records over time.

There is relatively little Government-funded research addressing this issue. Specific examples include the $24 million that the National Science Foundation and other agencies gave out 4 years ago in the National Digital Library Initiative, phase one process. None of the six funded projects explicitly addressed the preservation of those electronic records. In the latest round for DLI–2, the National Endowment for the Humanities and the Library of Congress played a more active role in the process and stressed those issues, but nonetheless, out of 33 funded projects there were only two that explicitly focus on long-term access and preservation.

I would like to read the comments William Ferris made in talking about the Cornell project. He said, "NEH, the National Science Foundation, and other Federal agencies have begun the process by funding a pioneering, $2.3 million preservation project at Cornell University. This project will develop a standard way of organizing computerized collections, preventing data loss in these collections by alerting managers to the periodic need to upgrade ageing CD-ROMs and tapes, and making the collections fully accessible on the Internet. All Americans will benefit because the project will ensure that computerized materials important for the study of America will be preserved and accessible for generations to come."

While I appreciate Bill Ferris' kind and generous words of confidence, Cornell's project will not save the day. It will only contribute to a process that needs many other participants. Additionally he described it as a "pioneering" project. That is true, but it should not be. We are all behind the curve on this issue. We are probably as much as a decade behind where we should be at this point in time.

Nor in the corporate sector has a great deal of progress been made in spite of the obvious permeation of this need across the entire spectrum of corporate and business operation. I think one of the reasons for that is that corporate archivists have often been responsible for paper records, but systems professionals have been the ones responsible for electronic records. They have not had an archival perspective on their job. The result has been that when we moved to an environment in which almost all records are generated in electronic form—or a large segment thereof—we do not have an archival perspective or incorporate archival value into the process.

I can see a 500,000-person sub-industry developing around this very issue in the next 10 years.

So this does suggest that in spite of real headway NARA is making at this point in time—particularly through the San Diego Supercomputer Project—that we are just now beginning. I wish we had been here in 1992 instead of 1999.

I would like to add one other comment on technological issues but let me jump back and say just one thing on the 2000 census issue. For me, this is an indication that the preservation of records is not just a technology issue. The issue is: How will the users be able to use that information? So we have social, technological, and

economic issues combined in the decisions we are making today. We have to have some working models in place that actually provide usable records for the user for us to guide us in making the technological decisions.

I apologize for the digression, but I think it is an important one.

I will conclude my comments by saying that I think that more of the information from the National Archives that is in existing paper and image form should be made available digitally. I know that at this point in time Governor Carlin has chosen to focus a good deal of resources on the electronic records issue. However, I think the American public and the global public expects to have access to significant portions of the archival record in the classrooms, in the lecture halls, in the libraries, offices, homes, and in the wireless generation, every place.

This relates to your reference to cooperation with the Library of Congress. Perhaps in this process, the National Archives might work in explicit cooperation with the Library of Congress or with university repositories or State repositories, using common systems for distributing access to digital information.

I have extended beyond my time, I suspect, so I will wrap up by saying that I greatly appreciated the cooperation that Governor Carlin has initiated with the leadership of the Society of American Archivists. We have never had such an effective and synergistic relationship. I personally thank him a good deal for that.

Thank you.

[The prepared statement of Mr. Hickerson follows:]

Testimony Submitted by H. Thomas Hickerson
to the Committee on Government Reform's
Subcommittee on Government Management, Information, and Technology

Oversight Hearing on the National Archives and Records Administration
October 20, 1999

Subcommittee Chairman: Congressman Stephen Horn

H. Thomas Hickerson is President of the Society of American Archivists and Associate University Librarian for Information Technology and Special Collections at Cornell University

It is an honor and a pleasure to have this opportunity to appear here today to provide testimony regarding issues critical to the National Archives and Records Administration. While I will address several general issues, I will, as requested, focus my remarks on the application of digital technologies and particularly on the management of electronic records. My comments will reflect three areas of experience:

(1) My experience of nearly thirty years' involvement in archival practice and extensive professional leadership, including my present service as President of the Society of American Archivists;

(2) My direction at Cornell University of the principal archival and rare book programs, my development over the last eight years of an institute at Cornell dedicated to the building of digital collections based on cultural and scientific holdings, and my present responsibility for library information technologies at Cornell; and

(3) My United States citizenship.

While the first two of these provide the basis for my authority and expertise in these proceedings, my citizenship also provides a strong incentive for my the interest in the successful operation of the National Archives and Records Administration (NARA).

In recognizing the importance of NARA for every U.S. citizen, we have only to look at recent experience in Kosovo to see that invading forces sought to systematically destroy land, financial, citizenship, and genealogical records in an effort to destroy economic and political rights and community and cultural identity. In the United States, responsibility for maintaining the archival record is broadly distributed among state and municipal archives, university, corporate, and religious repositories, research libraries, and historical societies and museums, but no institution other than the National Archives is so central and fundamental to the rights of every citizen and to the process of democratic governance. That we dedicate only $200 million annually to this large, complex, and vital undertaking is, on one hand, regrettable, and on the other, a rather remarkable bargain. For I do feel that in spite of the extent of the challenge, overall our National Archives has served us well. But it could have done more in the past, and it must do more in the coming years. The future of the archival record is at a critical juncture. Congressman Horn, I urge that you and your colleagues vigorously assist in this critical transition.

We are living in a time of dramatic and continual change, both large and small. Against a seemingly constantly evolving tableau, the dominant transformation of our time, the information revolution, is taking place. This revolution focuses on information creation, dissemination, use, management, storage, and preservation. As a result, archivists are facing some of the most vexing challenges of modern-day information management, confronting issues essential to government, corporations, institutions, and organizations in operating effectively and in fulfilling their legal requirements. At the same time, archivists continue to be dedicated to preserving and supporting the use of large existing collections documenting historic achievements, social and industrial development, and the experience of everyday life.

As we enter the new century, the pace of change and a growing sense of the seeming fragility of the human record have served to significantly expand the appeal of original materials, as well as the interest in access to digital facsimiles. Museums and other cultural repositories are enjoying extraordinary

growth in attendance. In Texas, for example, the Johnson Presidential Library is second in number of visitors only to the Alamo, itself an historic site and museum. Thus, we are faced with the paradox of society's increased interest in historical documents, images, and objects, both in artifactual form and in digital representations, while current records are increasingly generated in electronic form, and e-mail, e-commerce, and Web sites are the predominant means of written communication. In reviewing the mandate and priorities of the National Archives, we must keep in mind this confluence of pervasive interest in our documentary heritage and ot transformative changes taking place worldwide. Ideally, an integrated continuum will be established between the records and services of this century and those of the next.

In my specific comments, I will concentrate on three aspects of NARA's mission that I feel are central to their success in the next decade. The first is managing records generated in electronic form. The second is leadership in innovative applications of new technologies. The third is the need to extend services to users and broaden the value of the nation's archives for the American public. Although this third topic is more general, it is related to the other two. While I will express significant concern regarding progress on these issues, I will also emphasize my belief that significant change is underway in all three areas.

Managing Electronic Records

In a report of the House Committee on Government Operations, "Taking a Byte out of History: The Archival Preservation of Federal Computer Records," submitted November 6, 1990, many of the difficulties inherent in the selection, preservation, and use of electronic records over time were clearly identified. Though the nature of the problem and its importance were perceptively stated, recommended actions were explorative in approach rather than action-oriented. No new research was funded; no new programs inaugurated. It is now nearly a decade later, and there is not yet a scalable working model in place for realistically addressing these issues.

While I feel strongly that NARA has been slow to dedicate the necessary resources to this challenge, others have also lagged. We are all a decade behind, and we are only now beginning to confront the issues of long-term preservation and use of digital information in a serious fashion. It is not surprising that the technology industry has not focused attention on the impermanence of digital information, and when they have, they have talked principally about the lifespan of particular media, such as magnetic tape or CD-ROMs. While media permanence is important, it is not the principal challenge. If the bits survive, will we continue to be able to read them when hardware and software generations come and go with increasing speed? We must decide at the point of data generation which information should be retained and usable over time and design a path for migrating those records from one software and hardware generation to the next. At this point, we should not feel secure that the necessary procedures are in place.

The need for research and testing of methods of migrating information from one technology generation to the next or the development of other means of retaining the capacity to use today's information tomorrow is urgent. Government-funded research has not yet made this issue a priority. Of the six projects selected four years ago in the first phase of the National Science Foundation's (NSF) Digital Library Initiative, none highlighted this issue. In the recently completed Digital Library Initiative Phase 2 competition, in which NSF was joined by several additional federal partners, including active participation by the National Endowment for the Humanities (NEH) and the Library of Congress, greater attention was directed to long-term viability. Nonetheless, out of thirty-three projects funded, it appears that only two projects, those at the University of Michigan and at Cornell University, are focused on preservation issues. In describing the funding of the Cornell project, a joint project of the Cornell Library and the Computer Science Department, William Ferris, Chairman of the National Endowment for the Humanities, reported, "NEH, the National Science Foundation and other federal agencies have begun the process by funding a pioneering, $2.3 million preservation project at Cornell University. This project will develop a standard way of

organizing computerized collections, preventing data loss in these collections by alerting managers to the periodic need to upgrade aging CD-ROMs and tapes, and making the collections fully accessible on the Internet. All Americans will benefit because the project will ensure that computerized materials important for the study of America will be preserved and accessible for generations to come." I would like to make two responses to these inspiring remarks. First, while I appreciate Bill Ferris' words of confidence, Cornell's project will only contribute in generating a viable solution to this momentous problem, and second, while he is correct when he says that it is pioneering effort, it should not be. We are all way behind the curve on this issue.

Regrettably, the corporate and institutional sectors do not yet seem to have made significant steps forward either. In part, this is due to the reluctance of the technology industry to bring attention to this issue. Perhaps more importantly, however, it is because of a division of responsibility between those responsible for paper records, frequently corporate and institutional archivists, and those responsible for computing systems, data processing professionals. System designers and programmers have seldom reflected an archival viewpoint, and now that records are frequently available in digital form only, this division of management and perspective will have significant repercussions. I foresee the potential for a 500,000-person sub-industry developing around this issue, and a significant number of those will be archivists, equipped with new skills but embodying traditional archival knowledge and values. The Society of American Archivists has been offering electronic records workshops since the 1980s, and a new distance learning course is so heavily subscribed that we are now taking applications for next year.

While NARA has a long record of active involvement with the management of electronic records, this responsibility must now become a priority in the allocation of resources within the agency. This change and others basic to the new digital environment may be traumatic, but they are necessary. Applied research will be important within NARA, but viable solutions will only be developed and implemented through partnerships with other agencies and

with academic, corporate, and professional partners. I am very impressed by recent NARA initiatives of this nature. The Collection-Based Long-Term Preservation Project at the San Diego Supercomputer Center is an outstanding example. Scientists at the Center are working with several federal agencies to develop and test means of preserving the organization of digital collections simultaneously with the digital objects that comprise the collection. NARA is also actively involved in the InterPares Project (International Research on Permanent Authentic Records Electronic Systems), an international theoretical and methodological research project. This project highlights the global nature of this issue. It is supported by funds from agencies in several different countries, including the National Historical Publications and Records Commission, a small funding agency located within NARA that has proven vital to research and development in this area. NARA's involvement in collaborative efforts is essential, and the National Archives should maintain an open professional dialogue regarding successes and failures. Knowledge of their experience will benefit archivists wordwide.

In closing my comments on this issue, I want to emphasize that solving this issue is not just a technological one. It is also a political, social, organizational, and economic issue as well. And it doesn't just require more and differently allocated resources for NARA. An example is the planned retention of data in the individual responses generated by the Year 2000 Census. My understanding is that current plans are for the transfer through optical character recognition (OCR) of the information on the forms at a 98% accuracy rate and storage of that information in ASCII (a basic standard for recording electronic data) on magnetic tapes for retention by NARA. Alternatives would be to create digital image copies of each form and/or create microform copies. It seems that the present choice is based on the project contractor's projected costs. While the technical suitability of each option is deserving of professional investigation, we must also factor usability by those citizens most affected by our choices into such decisions.

I have raised the issue of the Census only as an example of the need for various criteria to be considered in making these technical decisions. In developing solutions to this critical challenge, we must balance our interest in technical efficiency with the requirements necessary for effective governmental and citizen use over time. Our models must incorporate these factors effectively, and we are already a decade late in implementing them. We are losing valuable information today, and more will be lost tomorrow. This is the Y2K that will not go away next year.

Innovative Use of Technology

In the 1970s, when I first began to experiment in the use of computing technologies for archival management, I employed a software package called SPINDEX II (Selective Permutation INDEXing). This software, though based on a precursor created at the Library of Congress, was developed and maintained by the National Archives. A later version was used by Cornell to build a database describing archives and manuscript held by some 1,100 repositories across New York state. In the mid-80s, this information was transferred into the Research Libraries Information Network, an online network that is now the principal international catalog for archival holdings.

In developing and testing SPINDEX, NARA established a partnership of ten institutions, including state, federal, university, and corporate repositories. For those of us who began with SPINDEX, this experience and NARA's leadership were very important. In the early 1980s, however, NARA turned inward in its systems development efforts. At a time when many repositories were adopting common cataloging standards that facilitated the use of existing systems and online access to research information, NARA chose not to adopt these standards. Asserting the unique requirements of the National Archives and refusing to modify existing practice, NARA developed multiple, mutually incompatible systems in-house. To my knowledge, none of these systems have survived, and the goal of SPINDEX development twenty-five years earlier,

providing automated access to summary descriptions of all NARA holdings is yet to be realized.

The National Archives has now again embarked on an initiative to provide comprehensive access to cataloging for all NARA holdings. While I still applaud this goal, I am concerned that they have chosen a British system not widely employed in this country. I am not presently able to evaluate the basis of their selection. I have, however, just completed directing the last stages of a four-year selection process to choose a new management system for the Cornell Library. It happens that the system chosen by Cornell has also recently been chosen in exhaustive competitions at the Library of Congress and the National Library of Medicine. I am not suggesting that this system would be ideal for NARA, and I readily acknowledge their differences from these other institutions. Nonetheless, in this age of system interoperability and Internet access, I fear that unique internal needs may be guiding their choices when the ability to provide easy access for agency staff, researchers, and the public should be paramount. The intent of my comments is not to urge use of particular software, but to emphasize that common standards and solutions developed and applied in cooperation with other agencies and institutions are required for success in today's information environment.

My fear that paper-based management and service procedures are still dominating strategic policy is further heightened by the present decision to delay further production of digital copies of NARA holdings for public access via the Internet. As John Carlin has explained to me personally, NARA has chosen to focus on the complexities of electronic records, those originally generated in electronic form, rather than to devote present resources to the creation of digital facsimiles of existing materials via scanners or digital cameras. While I understand the basis of his choice, I must emphasize that the fundamental nature of access to information is changing, and that users expect the availability of both information created in digital form and distinctive holdings copied digitally.

I am not suggesting that NARA will ever convert the majority of its existing holdings to digital form, but the effort by the Library of Congress' American Memory Project to build a virtual collection of 5,000,000 images is broadly perceived as an outstanding success. The Cornell University Library has nearly 2,000,000 images from historical, artistic, and scientific collections available, and a recent survey conducted by the Association of Research Libraries, some 120 of the largest research libraries in North America, found that over 90% of their members were presently conducting or planning projects to digitally convert unique holdings. I do not believe that NARA's decision to suspend conversion efforts at roughly 122,000 documents and visual images is in the best interests of the National Archives nor its global public. Our archives should be available in classrooms, lecture halls, libraries, offices, and homes, as well as everywhere else in a wireless world.

As the closing paragraph in the introduction of *Newsweek's* October 11, 1999 section on "e-life" explains, "We're at the beginning of a new way of working, shopping, playing, and communicating. At *Newsweek*, we're calling this phenomenon e-life, and it's just in time. Because the day is approaching when no one will describe the digital, Net-based, computer-connected gestalt with such a transitory term. We'll just call it life." Our nation's archives have to be part of that life.

Extending Services and Broadening the Value of the Nation's Archives

This third topic is very closely related to the preceding discussion of broadening use of NARA's holdings and services via new technologies. A similar interest must be employed to make the experience of the National Archives compelling for those onsite. I am absolutely thrilled by Congressional support for the renovation of the National Archives Building on the Capitol Mall. The planned renovation will dramatically improve storage conditions for records housed there, and it will provide a state-of-the-art technology infrastructure for both staff and researchers. Both of these improvements are critical and long, long overdue, but I must admit that I am most excited by the plans to implement

a new concept in the display of the Charters of Freedom, the Declaration of Independence, the Constitution, and the Bill of Rights, and in other exhibition areas throughout the building. As designed, these displays will heightened the significance and level of engagement of viewers through carefully realized pictorial presentations. The planned theater offers the opportunity for new multi-media presentations, similar to those that can be made available through the Web. Although I am aware that private fundraising is required to complete this effort, I urge your fullest support. I applaud the imagination and vision of John Carlin and his colleagues in designing such a wondrous home for these remarkable documents. I think that it will generate a new spirit among visitors, researchers, and staff.

Concluding Remarks

In conclusion, I would like to express on behalf of the Society of American Archivists my warm appreciation to John Carlin for his efforts to develop a cordial and synergistic relationship between NARA and the Society. Mutually beneficial collaborations have developed, and I am confident that our cooperation will grow. The archival profession needs a strong National Archives. I believe that John Carlin is providing effective leadership in confronting current challenges. I urge your support of his efforts and greatly appreciate the opportunity to address you today regarding the future of this distinguished institution so important to each of us.

Mr. HORN. Well, we thank you. That is a very worthwhile presentation.

Governor, you have heard the testimony here. Is there anything you would like to say to some of these questions that have been raised? I am particularly interested in what your person power projections are in terms of getting the descriptors that Ms. Miller mentioned and the degree to which scanning technology can help you in getting the right descriptors.

Mr. CARLIN. As I said earlier in regards to populating the catalog and carrying out what Ms. Miller is very interested in—as well as us—I cannot say today what that might mean from a resource perspective. I always believe in maximizing existing resources first rather than making the first task coming to you and asking for more. We have done a lot of work and have a lot of people work in this area in what is referred to as the old way. We are converting to a new way.

We have just hired three data standards experts staff to come on and help us. We want to really improve our descriptive standards in such a way that there is uniformity. As you go electronic, you no longer can have differences. So there is a lot of basic work that needs to be done before we would be in a position to say that we need more help.

I can assure you—just as I did when I was sworn in as Archivist—I would not hesitate to come and ask for help when I felt like it was legitimately needed.

On the second issue you raised, as far as scanning, we have taken a different approach than the Library of Congress. Our focus has been to scan and digitize a cross-section of very valuable, often requested records. The current project, which we completed in the early part of this calendar year, scanned and digitized and put up about 125,000 documents.

We intend to then focus, as we are now, on the catalog, which would be a total comprehensive catalog. We would then link to these digitized examples so that researchers could see at least a sample of what they might be able to work with if they were to work directly with the records. As far as expanding beyond that, our philosophy is that given focused interest on highly used records, that we will explore further scanning digitization if we can also find the resources—or know where the resources are going to be—to maintain that effort.

Our experience, as well as looking at other research, tells us that the initial cost of going through the process of selecting, scanning, digitizing, and putting up on the Internet an existing non-digital record—but getting it in the digital form—the cost of maintaining that will almost duplicate the initial cost every 10 years. That is a scary challenge, which has led us to decide that if we are going to put more up, we are going to have the maintenance endowed up front.

If someone comes with an idea of private support, it will not be just to do the first effort, but to maintain it. I know from experience the excitement of getting up some wonderful collection, which may raise private dollars, when you talk about maintaining that collection, there will not be quite the excitement because there will not be a press release or a news conference announcing that we got

the resource to keep it up. So we have taken a more conservative approach out of fear that we could get to the point where we wouldn't be able to sustain what we put up.

Now born digital is a whole different ball game. But what we are really talking about here is the non-born digital that requires extensive work and expense over time to accommodate what is—I agree 100 percent—there is a great deal of interest and demand out there. But I also want to respond in a realistic and appropriate way and not get ourselves into a commitment we cannot sustain.

Mr. HORN. Any reaction by members of the panel?

Mr. HICKERSON. I have said this in conversation with John Carlin. I think that an agency with the role of the National Archives cannot afford not to make material available via digital networks. I agree that it is an expensive process. However, I think we really have to accept that the 21st century is a very different world than the 20th was and that there will be an expectation that such materials—or certain small portions, perhaps statistically small portions of them—will be made available. And there is such potential for remarkable use out there in that form. I think it is one of those things that you cannot afford not to do.

I think the transition—and I can speak to Cornell University's transition in moving from a library of 6 million books and 40,000 cubic feet of records to a repository also including 2,000 electronic resources and 2 million images accessible in networked fashion—moving the money as well as the conceptual thinking of the staff and the institutional mandate—to incorporate a very different view of the way people use information today is a traumatic effort.

Mr. HORN. We have to educate the user as well as the Archivist?

Mr. HICKERSON. Yes, indeed.

Mr. HORN. On the user and the need for the Archivist, what is your impression—since you are president of the Society of American Archivists—as to how we educate and train archivists? Is it simply going to library school and then getting what the doctors might call a residency in a good archive or the National Archives? And do we have people coming along to fill the bill in this area?

Mr. HICKERSON. I do not think we have enough people coming along to fill the bill. I had a discussion the day before yesterday with the executive director of the Council on Library and Information Resources about forming a panel to look at the development of a new generation of archivists and librarians and what kind of educational components will have to develop to meet that need.

There are now masters in archival science programs as well as library science programs that have archival concentrations. My sense is that in terms of the need that we may have over the next 10 to 20 years—and certainly a lot of the career surveys agree with me on this—is that we will not produce enough people via that avenue. The Society continues as it has since the 1980's—conducting workshops on electronic records. Many of those workshops were staffed by people from NARA. But we have just created a distance learning workshop on electronic records. It has been so oversubscribed that we are already booking people for next year.

So I do not have a good answer to your question except to acknowledge that we really have to do some things differently.

Mr. HORN. Let's get back a minute to the scanning devices that can be used.

Where are we in the evolution of computing and what kind of scanning devices would be helpful? Does the National Archives now have them?

Mr. HICKERSON. As Governor Carlin notes—and I do not want to answer every question——

Mr. HORN. No, we are moving around.

Mr. HICKERSON. It can be an expensive process. At Cornell we have experimented with some fairly high-speed flat bed scanning where you just put it down and the machine automatically adjusts to the conversion requirements. You can move it through at a fairly fast rate. On the other hand, we also do art work in which we use a digital camera that in full scale production runs about 70 documents a day, 70 pieces of art work.

So it varies greatly. The technology has improved and the costs are coming down significantly from where they were.

On the other hand, we have the same preservation problems regarding these digital images that we do for the born digital records in that we do need to have migration paths for this information also.

At Cornell, we have sought to develop a larger vendor industry by doing less of the work in-house and putting out very specific standards, projects, and we hope—as we did with high-level preservation microfilming—to generate a small industry around the need to do this scanning. We have had some very significant success in lowering the per image cost as a result of those efforts.

Mr. HORN. Mr. Stevens, are any of the people in GAO looking at the technical side of what might happen in an archive, be it State or Federal?

Mr. STEVENS. No, they are not, Mr. Chairman.

Ms. MILLER. On the question of cost, I wanted to add that historians like to look at a whole series of records. So when we do research, we would want to look at a whole box. Frequently, when the scanning occurs, it is only of selecting particular documents. Then that alerts historians so that they are aware of those selected documents and then historians want to go to the archives to see all the records in the box surrounding that particular record.

But the National Archives estimated—I heard this at one of their presentations last week—that it costs about $15 per page to digitize, select, index, and handle all that is needed for every page. If you go back to that image I used of a shelf of 650 miles, and if you think of 2,000 pages in a foot, I figured that at $15 per page, that is $102 trillion to scan the holdings of the Archives. That is totally out of the question. And even if the price comes down from $15 to $1, you are still talking about almost several trillion.

So I think the volume of records in the Archives is so enormous that the scanning will be for very select documents and will probably be used in teaching, but not by college professors who are doing research, who will really need to see a whole collection. We are still putting our priority on the finding aids. Just to have a comprehensive catalog of finding aids on-line would be a wonderful first step.

Mr. HORN. Mr. Hickerson, is the high-speed computer at Cornell willing to tie into the National Archives and run a deck of those letters through and scan and do that? What kind of incentive would it take to get you to do that?

Mr. HICKERSON. I think there really are opportunities for cooperative projects. I certainly agree with Page Miller that the expenses of a comprehensive conversion are far beyond anything I could imagine.

But there are diverse opportunities to bring materials together from multiple repositories in digital form that cannot be seen at any one repository together and these are projects in which we would work with the National Archives—I know in the case of records of Japanese-American relocation camps, both Cornell and the National Archives and UCLA have significant holdings. Wouldn't it be wonderful—and these are very heavily used items if those could be united in a virtual collection in a way that no single user could access them at their physical locations?

We would be very open to such projects. We have contractual relationships with the Library of Congress to make material converted at Cornell available through American Memory and would be pleased to look at similar partnerships with the National Archives.

Mr. HORN. Dr. Katz, you had a comment?

Mr. KATZ. I was actually going to followup on this.

I think we all agree that is inconceivable to get the whole corpus up at any time, but it doesn't need to be because not all documents are created equal. There are ways of selecting and choices can be made. I think what has just been said is the key, and that is collaboration. Too often—and I think it has been true of LC in the past—individual institutional decisions have been made on what to digitize. But what we need to do with limited resources is to build coalitions—public-private coalitions—to make some determinations, depending on the ultimate use of those collections. There have been some attempts at that. The Digital Library Federation now is one, a private sector mechanism to do that.

That is where I think cooperation with NARA is going to be absolutely essential because it is inconceivable to do the whole thing.

Mr. HORN. Let me just get to a couple of things that have come out in the testimony.

The year 2000 performance plan, as we noted earlier, projected that the National Archives will convert 10 percent of existing records, series descriptions, or finding aids to an on-line archival research catalog. What we asked earlier was, Do you believe this is a realistic goal? Do you believe that the target for 100 percent completion by 2007 is a realistic timeframe?

Obviously, I think the Archivist thinks it is.

Mr. CARLIN. I think the 2007—I certainly do not intend to give away that goal. The 2000 goal, as this year proceeds, may look less and less realistic as we try to finalize that first step. But the value of that catalog is heavily dependent upon getting it fully populated. We are well aware of that and see it as a huge achievement that we have to focus on. It is important to researchers and important to the mission we have.

Mr. HORN. Is there a real need for training your current archival staff because they really might not have been involved that much in technology? To what degree do you face that situation?

Mr. CARLIN. There will be the need to train so that we are proceeding in a way that is efficient, uniform, that fits the specific data elements that need to go in, et cetera. That is why we are trying to bring some agency-wide focus to this, not letting it be done all over the agency in whatever way is customary for them to deal with it, but to make it uniform. It is one of the lessons you learn quickly in the electronic age. You must have standards. That machine cannot quite negotiate two different approaches to the same task.

We are working very hard to get those standards established and working very hard, as a followup to that, to make sure that we train the staff across the agency while doing the populating description work.

Mr. HORN. What else could we do in terms of private corporations? It seems to me in business archives there would be a market out there in scanning business archives—especially when they get sued—to go through their papers with key word indices to see where these papers are and so forth. Is there any hope of collaboration with American business in some of this?

Mr. CARLIN. Yes, there is. In fact, there is existing today a considerable amount of collaboration. The focus to this point has been primarily with the pharmaceutical industry, which has some of the same concerns we have in terms of long-term preservation of this new medium because of their liabilities, their focus on patents, and so forth with the products they produce and market.

So they are a player at the table in one of our major research projects today. They have been. That project started about 18 months ago.

Mr. HORN. I am interested in the technical side. I do not know if we have enough experts here on that, but how is that coming? Let's face it, the more you get out, the more the price per unit goes down. Where are we working on this? Cornell? Stanford? Berkeley? Are they all involved?

Mr. HICKERSON. There are many universities involved in applicable research. Some of the important work focuses on the security, accuracy, authenticity, and reliability of systems, which applies broadly both to our defense capacity as well as other areas such as NASA's mandate.

So a lot of diverse research is in progress. I am hopeful that we will turn seriously to the issue of preservation of electronic records in the research sector. This has previously not been seen as sexy or cutting edge research because it is not moving on beyond the next new technology; it is looking back.

But I think we have moved to a point of awareness and soon we will see resources redirected—and it does apply to business just as much as it does to Government, and certainly to university administrations and everywhere else. I do expect that the technology industry will turn to this issue and devote a good deal of attention to it.

Just a quick anecdote, I was speaking with a computer science professor—a respected individual named Ken Birman—and we

were talking about this issue in a seminar setting. He said rather impassively, "I think that technically and economically and organizationally we will get this solved by about 2015, and probably everything between 1995 and 2015 we will lose most of it. But that is a reasonable loss for a transformation of this size."

I said, "Ken, I don't think society has given any indication it would find this a reasonable loss, but I can't guarantee you it won't happen."

So I think we will reach the point of successful management, but we need to reach it a little faster than we are moving right now.

Mr. HORN. What do we know about the security of these records in a digital age and how they can be damaged? We all take our disks out at night so we don't have to redo everything we have done during the day. But beyond that, when you have documents that can be, I am sure, marred in some way by somebody that wants to make mischief—either a disgruntled employee or whatever it is, it happens in doctor's offices and hospitals when they want to get even—so we have all those dangers. How can we protect against it on vital records?

Mr. HICKERSON. As I said, a lot of research DARPA is funding concerns security issues for systems. But whether that applies to every individual user out there and when those tools will come into common availability—I certainly cannot speak to that. I see this as a crisis because we have made this transition to a largely electronic world without building very much of the human infrastructure that really guarantees its usability.

Mr. HORN. Mr. Stevens, given your report, the National Archives' fiscal year 1999 performance plan indicates that the business process reengineering plan would be complete in 1999. However, the 2000 performance plan notes that the business process reengineering plan is scheduled for completion in 2000. What is involved in a business process reengineering effort in terms of the GAO? What do you feel on that?

Mr. STEVENS. There are many aspects to it, Mr. Chairman, and the archivist has described a number of them. I tend to separate it in two components. One is the internal and the other is the external.

Internally, obviously the National Archives and Records Administration has agreed they will have work to do to figure out how it is going to interact with agencies. That means looking at the paper flow, policies, guidance, training, and that sort of thing. And that is not a misplaced emphasis.

What struck us when looking at electronic records management as an issue as opposed to NARA as an agency was just how little information is available about what is going on in the places in the Government that really have primary line responsibility for managing electronic records at this point in time, and that is the agencies themselves. We were surprised at how little NARA really knew about that as well. They had recognized this issue in past years and I think quite sensibly had laid on the baseline where-are-we-now survey. We felt that the information coming out of that would be very valuable—not just for NARA's own purposes in framing its policies, guidance, paper flow, business process in general—but also

for the agencies themselves and noted that in their strategic plan keeping up with the agencies was an integral element.

So we were sorry not to see that information come available, at least for a couple more years. It is a matter of timing. I think they would agree that this needs to be done. We would like to see it done a little sooner, partly because our focus is a little more Government-wide, a little more issue-oriented, and theirs is more agency-based.

Mr. HORN. Do you think the National Archives' estimate that the process will take 18 months to 24 months is reasonable?

Mr. STEVENS. Given our experience in other agencies that are going through the Government Performance and Results Act, reexamination of their functions and processes, I would say that is certainly reasonable, maybe even optimistic. It is a complicated job for people to reexamine fundamentally what they are doing and how they are doing it.

Mr. HORN. One of the things this subcommittee will be doing, once we get through this Y2K bit and have maybe a hearing on the retrospect of what went right or wrong, will be to look agency-by-agency—and obviously we want the General Accounting Office's help on this—to look at upgrading their computing capacity, because that has been one of the problems. Some agencies are three, four, or five generations behind. The Congress really needs to face up to that and move ahead on it.

It seems to me that you can build into this the archival end at the other end of the process, and we ought to be thinking about that.

Mr. STEVENS. You should be able to do that. Right now, we just do not know what is happening. My suspicion is that nothing much is, but we cannot prove that.

Mr. HORN. I think we will give the GAO 6 months to do one of its wonderful reports as a lead-off witness. So maybe we can work that out as to the questions that need to be asked. We welcome from all of you, also, What questions do we have to raise if we are going to make a rational decision in the executive branch, OMB, the President, and the Congress? That is where I am headed in terms of getting this Government up to speed in this technological age.

Any comments any of you would like to make?

We are going to wind this up, but we thank you for starving to death through the lunch hour.

Anything else anybody would like to say for the good of the order?

If not, just write us a note and we will put it in the record at this point, or if you do not want it in the record, you just want it for guidance for us, that is fine, too. We would love to have it.

You are all wonderful people and we appreciate what you are doing. Governor, you are running a great institution there. Future generations will appreciate it, I hope, just as much as current generations. I thank you and your staff for coming.

With that, I have the staff list as to who helped on this. J. Russell George, the chief counsel, is not here. He is over at the Pentagon going through their Y2K things. Matthew Ebert, to my left and your right, is the policy advisor who put this hearing together.

Bonnie Heald, director of communications, professional staff member; Chip Ahlswede, the faithful clerk; and we have two great interns here, P.J. Caceres and Deborah Oppenheim. On the minority staff we have Trey Henderson, counsel; Jean Gosa, minority staff assistant.

And we have Mel Jones, who is probably as glad as we are that this session is over. Thank you, Mel, for reporting these proceedings.

With that, we are adjourned. Thank you very much.

[Whereupon, at 1:26 p.m., the subcommittee was adjourned to reconvene at the call of the Chair.]

[The prepared statement of Hon. Jim Turner follows:]

STATEMENT OF THE HONORABLE JIM TURNER
GMIT OVERSIGHT HEARING ON "THE NATIONAL ARCHIVES AND RECORDS ADMINISTRATION"
OCTOBER 20, 1999

Thank you. I want to commend the distinguished panel for their testimony today, as well as the chairman for his focus on this issue. As our national record keeper, the National Archives and Records Administration's mission is to ensure that federal officials and the American public have ready access to essential evidence – records that document the rights of citizens, the actions of government officials, and the national experience. This important service enables people to inspect for themselves the record of what the federal government has done and hold officials and agencies accountable for their actions.

The National Archives carries out this mission through a national network of archives and records services facilities stretching from Washington to the West Coast, including 10 Presidential libraries documenting administrations of Presidents Hoover. The National Archives has a tremendous responsibility and it meets thousands of information needs daily. However, as the rapidly changing technology of the digital age transforms how society communicates, the National Archives is faced with a new set of challenges on how to preserve records for future generations.

This hearing will focus on several issues confronting the National Archives, including: electronic records management, declassification of historic documents, the revolving fund, and the National Archives' strategic plan. It is important that Congress ensure that the National Archives receives the support it needs to accomplish its goals. The priceless treasures of American history placed in the care of the National Archives are the heritage of every American, and our faith in public institutions depends on the accuracy of secure, open, and accessible records.

○