

**STATEMENT OF STEPHEN T. AYERS, AIA, LEED AP
ACTING ARCHITECT OF THE CAPITOL**

**Regarding Fiscal Year 2010 Appropriations
For the Office of the Architect of the Capitol**

**Subcommittee on the Legislative Branch, Committee on Appropriations
United States Senate**

May 7, 2009

Mr. Chairman, Senator Murkowski, and members of the Subcommittee, thank you for the opportunity to testify today regarding the Office of the Architect of the Capitol's (AOC's) Fiscal Year 2010 budget request.

I want to thank the Subcommittee for your support of our FY 2009 budget request and the programs and priorities we set out in that submission, as well as for your guidance as we continually work to achieve our goals to serve Congress with a commitment to excellence.

The past six months have been an extraordinary time for the AOC as the U.S. Capitol once again served as the nation's stage. On December 2, the doors to the Capitol Visitor Center (CVC) were opened to the public for the first time. Since that day, we have seen record numbers of daily visitors — just two weeks ago we saw our first day of more than 19,400 guests. Over the past five months, we have seen visitation at the Capitol double over the number of guests received last year.

Just six weeks after the CVC opened, the eyes of the world again turned to the Capitol Building for the historic 56th Presidential Inauguration. The AOC's involvement dates back to the 1860's when the Presidential Inauguration became a decidedly public event, and arrangements were made to allow the President to be closer to the people when taking the oath of office. We are honored to shoulder the responsibility for making all the infrastructure arrangements that are necessary to accommodate this event every four years.

Given the magnitude of this event, we knew there was no room for error – the President-elect must be sworn-in at noon on January 20. Our capable team rose to the challenge; working countless hours to ensure that the Presidential platform was constructed, the seats on the West lawn were in place, and all of the final details were completed to ensure that the ceremony was successfully supported.

As we worked to accommodate modern technologies into the Inaugural ceremonies, we also stayed true to our daily mission, which is to protect and preserve the national treasures entrusted to our care. Standing on the Inaugural platform, I couldn't help but think of the responsibility we have to ensure that the President-elect will be able to take his or her oath of office on January 20, on the West Front of the U.S. Capitol — the iconic symbol of our representational democracy — for generations to come.

With this in mind, the AOC has developed its budget request for the past several years to reflect the massive challenge of addressing the need to preserve the historic infrastructure on Capitol Hill, while recognizing the need for fiscal responsibility.

In fact, our Fiscal Year 2010 budget has been structured around four focus areas. They are:

- **Solving the Deferred Maintenance and Capital Renewal backlog;**
- **Following the Capitol Complex Master Plan process;**
- **Meeting Federally-mandated and Leadership energy goals;**
- **Managing and caring for the AOC work force.**

As I have discussed with this Subcommittee at prior hearings, we must continually manage the backlog of Deferred Maintenance and Capital Renewal projects, and have put into place a process by which to prioritize these projects.

Not only do we face the challenge of the upkeep of aging buildings, we need to keep pace with new facility maintenance and building technologies, as well as increased security requirements. Last year, the Cannon House Office Building reached its 100th anniversary, and in March, we celebrated the 100th anniversary of the Russell Senate Office Building. These buildings are

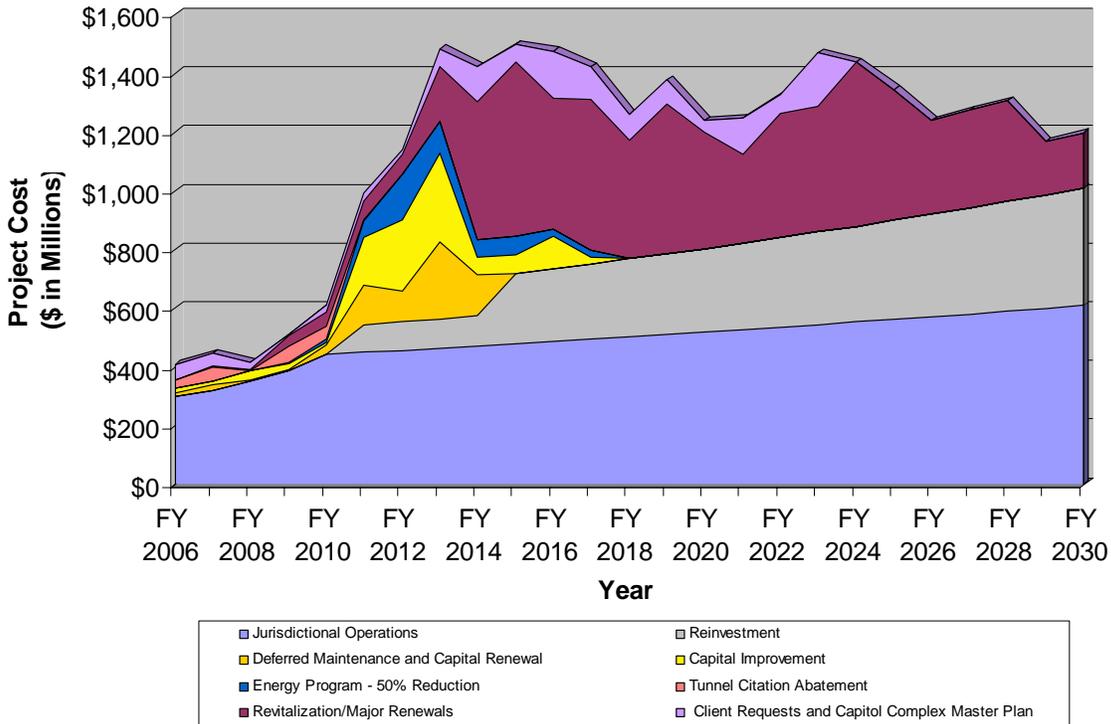
historic and iconic, and require extensive maintenance in order to preserve them, as well as ensure that they continue to serve as functioning, professional working environments for years to come.

The following chart — the “bow wave” chart — clearly shows that ongoing facilities requirements and new mandates have created a significant increase in resource requirements. Our FY 2009 budget request, and subsequent appropriation, was a significant step in buying down a portion of the bow wave. This includes addressing stringent, modern-day fire and life-safety standards, and abating Office of Compliance citations to improve safety conditions throughout the complex. Life-safety projects are very high priorities for our Agency.

However, we must continue to work on and to invest resources in projects that will prevent our critical facilities from further deterioration and failure. If we continue to defer these projects, the bow wave will move out and costs will increase over the long run.

Long Term Demand (2009)

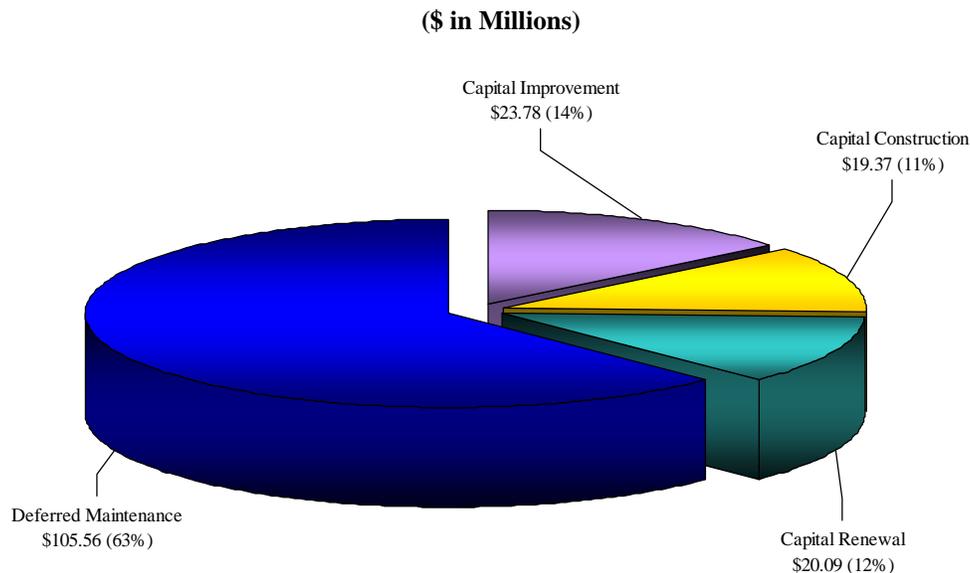
(\$ in Millions with inflation)



Capital Budget Request and Project Planning Process

Therefore, we are requesting \$644.6 million for FY 2010. We again utilized our program development process, which relies on the recommendations in the Capitol Complex Master Planning process, in structuring this budget request. This process assesses all the requirements of a project; determines the best way to implement these projects, including the option of “phasing” large projects over several years to manage costs and schedules; and prioritizes projects so that those of the greatest urgency are addressed immediately. We also took into consideration the need for fiscal restraint, and the challenge of executing the required programs efficiently throughout this process.

FY 2010 Project Request: by Classification



As the above chart demonstrates, we continue to invest our resources in the areas that have an “immediate” urgency rating: Deferred Maintenance and Capital Renewal projects.

We continue to refine the data on which our planning is based. For example, for the past five years we have conducted independent Facility Condition Assessments throughout the Capitol complex. These assessments identify the most critical issues in the facilities, and the objective data collected during this process helps us to identify the urgent needs that must be addressed expeditiously. Specifically, the data continues to show that “immediate” and “high” urgency

Deferred Maintenance and Capital Renewal requirements will increase dramatically over the next several years. If these conditions are not addressed within a reasonable amount of time, they will continue to deteriorate to the point where they can, and will, impact Congressional operations.

The Facility Condition Assessments also are used to determine a Facility Condition Index based on the backlog of Deferred Maintenance work. The Facility Condition Assessments and Facility Condition Indexes are used to predict the positive effect of investment and the negative effect of deferring work. Our assessments are showing that, at current funding levels, Capitol complex facilities are trending toward a “poor” rating.

Tied into the overall planning process is the Line Item Construction Program. During this process, projects are evaluated based upon an objective set of criteria.

These criteria include:

- **Preservation of historic or legacy elements or features of buildings or entire historic structures;**
- **Fire and life-safety, code compliance, regulatory compliance, and statutory requirements;**
- **Impact on mission including client urgency, and accommodation of new or changed missions;**
- **Economics, including value, payback, life cycle costs, and cost savings;**
- **Physical security, including protection of facilities and people;**
- **Energy efficiency and environmental aspects.**

The projects are further evaluated based on the conditions of the facilities and their components, and the urgency to correct the deficiencies.

As we developed our FY 2010 budget, we considered more than \$350 million worth of projects, and are requesting \$168.8 million for Line Item Construction Program projects. This prioritized list includes 36 projects; 32 of which are categorized as being of “immediate” urgency. The remaining four are categorized as “high.” An additional 85 projects remain on the deferred list.

Of particular note is a “high” urgency renewal design project: the Taft Memorial Renewal (\$240,000). The Taft Memorial was constructed in 1958 and requires significant renewal. Its Tennessee marble façade has shifted, and the stonework is in need of major repair. Included in the design are plans to make the surrounding plaza ADA compliant. If the major deficiencies in this landmark memorial are not addressed expeditiously, structural and system failures could lead to the loss of a historically significant structure.

The Senate Underground Garage has been identified by the Facility Condition Assessments as having serious deficiencies. It is rated “poor” in terms of its Facility Condition Index, and it is nearing the end of its useful life. The planned study would examine options for providing parking to meet anticipated future needs; address infrastructure issues and mechanical, electrical, and fire prevention systems that have reached their life expectancies, as well as improve energy efficiency.

Other key capital projects included in the AOC’s FY 2010 budget request are:

- Interim Painting of the Capitol Dome (part of ongoing rehabilitation project);
- Sprinkler System Design, Thomas Jefferson Building;
- Various egress, fire door, and ADA restroom improvements for Library of Congress buildings;
- Independence Avenue repaving;
- Cannon House Office Building Whole Building Renewal;
- Upgrading physical security at the Capitol Power Plant;
- Purchase Hazardous Device Unit and Vehicle Maintenance Facility for U.S. Capitol Police;
- Invest in Capitol Power Plant infrastructure;
- Construct Book Storage Module 5 for Library of Congress;
- Energy Conservation projects, such as Senate Office Building computer server closet cooling, HVAC controls replacement, and other projects identified by energy audits.

Mr. Chairman, I would like to call to the Subcommittee’s attention one project that has benefited from our comprehensive planning process — the Utility Tunnel Improvement Program. Last

year, we requested \$126.6 million for the program based on preliminary studies so that we could meet the five-year completion schedule per the agreement with the Office of Compliance. After submitting the FY 2009 request, we re-evaluated the program, examined phasing and contract options, and employed innovative new construction technologies to increase the pace of the work.

Based on the excellent progress made during the ongoing engineering work, we also evaluated and re-validated our approach to the project work, and refined our budget projection accordingly. We downsized our FY 2009 request to \$56.4 million. In FY 2010, we are requesting \$45.8 million to maintain our aggressive schedule to meet the settlement terms by 2012. All told, we were able to reduce the total projected cost of the Utility Tunnel Improvement Program from \$235 million to \$186.4 million — more than a 20 percent decrease. And, we remain on schedule to meet the settlement agreement terms by June 2012.



Concrete Repairs in Progress

This past year, we have repaired and expanded the existing communications system to ensure continuous communications capability in the tunnels. As a result, the Office of Compliance approved the closure of this citation in January 2009.

We also are engaged in an aggressive program to abate friable asbestos pipe insulation from steam, condensate, and chilled water lines in the tunnels.

Completion of this work is anticipated in 2010. In addition, the removal of spalling concrete is on schedule. With regard to tunnel temperatures, we have re-insulated all steam and condensate lines, the major cause of high heat conditions in the tunnels; improved the existing ventilation system to further reduce temperatures, and designed a new ventilation system to further improve temperatures. In addition, we've upgraded existing egresses, and we are installing new egresses where needed.

Energy Conservation and Sustainability Programs



The AOC has been aggressively working to reduce the Capitol complex's environmental footprint, and its overall energy consumption. In 2008, the AOC increased its use of natural gas; purchased renewable energy; and installed more than 14,000 compact fluorescent light bulbs. According to our analysis for FY 2008, these efforts resulted in the Congress reducing its energy consumption by 10.7 percent; exceeding the FY 2008 requirement of a nine percent reduction as compared to the FY 2003 baseline. For Fiscal Year 2009, the AOC is required by law to meet a cumulative 12 percent reduction under the Energy Independence and Security Act of 2007; the Green the Capitol Initiative requires a 16.5 percent reduction.

To meet these requirements to further reduce energy consumption, we have requested \$17 million in FY 2010 for Energy Program management, metering, and design and development of energy conservation projects. In addition, we have requested more than \$11 million for capital projects that were submitted and considered because they implement sustainability practices and/or contain projected energy savings.

However, the FY 2010 request is only a down payment on the investment needed to meet the requirements of the Energy Policy Act of 2005 (two percent per year for a total of 20 percent by 2015); Energy Independence and Security Act (three percent reduction per year for a 30 percent reduction by 2015); and the goals of the Green the Capitol Initiative (50 percent energy reduction for the House Office Buildings, Capitol Building, and Capitol Visitor Center, and 31 percent reduction at the Capitol Power Plant by 2017). Based on what is known today, to meet the Energy Independence and Security Act goals, we estimate current and future funding requirements of more than \$320 million.

To better identify and evaluate energy savings opportunities in Capitol complex facilities, we have been using energy audits since FY 2007. To date, the AOC has invested nearly \$2.5 million toward these audits, and the data collected will help us realize better cost-benefit results.

We also are implementing alternative funding strategies such as Energy Saving Performance Contracts. Under these contracts, companies invest their own capital to complete energy saving construction projects, and are then reimbursed from the savings generated by the installed projects. The AOC plans to use seven Energy Saving Performance Contracts across the Capitol complex to include individual contracts for the Capitol Building, House Office Buildings, Senate Office Buildings, Library Buildings and Grounds, Capitol Power Plant, Botanic Garden/Office of Security and Police Buildings, and Capitol Grounds.

However, the Energy Saving Performance Contracts alone will not be able to achieve the energy reductions goals mandated. We continue to purchase Renewable Energy Credits (RECs) and have requested an increase in FY 2010 funding to purchase the equivalent of 100 percent of our electricity in RECs. In addition, we are continuing our efforts to complete the program to install steam, electricity, natural gas, chilled water, potable water, and condensate meters across the Capitol complex. This is a key effort in terms of being able to measure current consumption, look for improvement opportunities, and measure energy savings results.

Because the Capitol Power Plant plays a critical role in our long-term energy conservation strategy, we are continually working to improve and upgrade operations there. For example, we are developing a Strategic Energy Plan, with the assistance of the National Academies of Science, which will influence our future Energy Program planning. Another step we took was to move toward maximizing the use of natural gas at the Capitol Power Plant.

In February, following the direction of Senate and House Leadership, we took immediate steps at the Capitol Power Plant (CPP) to further reduce the production of carbon dioxide, and we are now refining the engineering strategy for equipping the CPP to meet peak steam demands using only natural gas.

Specifically, I directed the CPP staff to begin its seasonal conversion to natural gas operations immediately. In previous years this conversion did not occur until late May. Assuming the weather remains mild and we do not experience any major equipment issues, we do not expect to burn coal for the remainder of this fiscal year.

As a result of this action, we anticipate achieving a fuel ratio of 75% natural gas and 25% coal for Fiscal Year 2009. This significant decrease in the amount of coal used compared to Fiscal Year 2008 will reduce carbon dioxide levels by approximately 6,700 tons. We plan to fund the purchase cost for the additional natural gas in Fiscal Year 2009 from available appropriations.

We are also looking at various options for continued energy efficiencies that have emerged throughout the development of the draft Capitol Power Plant Strategic Energy Plan, which we plan to share with this Subcommittee and Congressional Leadership in the coming weeks.

Over the past several years we have been working to create a healthy and productive workplace where environmental awareness and sustainability are the normal ways of doing business in the Capitol complex. There are a number of initiatives that the AOC has been engaged in, and we continue to see results in our efforts to improve energy efficiency.

The following is a list of just a few of our ongoing energy-saving/sustainability initiatives.

- We opened an ethanol (E-85) fueling station to Legislative Branch Agencies in October 2008, for use by official flex-fuel vehicle fleets.
- We replaced more than 14,000 conventional incandescent light bulbs with compact fluorescent lamps (CFLs) across the Capitol complex.
- We implemented a policy requiring the purchase or leasing of alternate fuel vehicles when replacing aging vehicles in the AOC fleet.
- We installed dimmable ballasts in 21 Senate/Committee office suites. The program typically saves 11,400 kilowatt hours per week or 40 percent of lighting energy used in an office suite.
- We installed a renewable, solar energy source for lighting in Lot 18 in fall 2008. These new solar-powered lights save approximately 1,825 kilowatt hours per year.



- We launched our energy awareness program: *Power to Save* in October 2008. We are providing tools and tips on our *Power to Save* Web site to encourage Capitol Hill offices to conserve energy. www.aoc.gov/powertosave.

- We more than doubled total tonnage of recycled waste from 1,400 tons to 3,100 tons from FY 2002 to FY 2008. Contamination rates remain at zero.
- We recycled 100 percent of all AOC computer and electronic waste which includes monitors, keyboards, computers, printers, laptops, and other types of computer hardware over past three years.
- We are using food waste, garden clippings, and other green waste, and repurposing it as compost for flower beds and to sustain other plantings throughout the Capitol complex.



Food waste repurposed into compost is used in flower beds.

Annual Operating Budget Request

Our FY 2010 annual operating budget request for \$423.6 million provides funding for continuing the routine activities of operating and maintaining the infrastructure which supports the Congress, other Legislative Branch agencies, and the public, as well as other AOC essential mission support services. Some of these services include financial management, safety, human resources, project and construction management, planning and development, communications, information technology, procurement, and central administration.

As I mentioned earlier, one of our four focus areas is the managing and caring for the AOC work force – our greatest asset. A budget priority for FY 2010 is providing the proper training for our people. Unfortunately, the AOC lags behind the industry standards in terms of automated facility management tools. Receiving the requested funds in this area would bring us closer to that standard, and increase our ability to manage facilities utilized by Congress and the American public.

Other operating cost increases lie outside the control of the AOC. Utility rates have risen, the cost of leases has increased, recycling and bulk waste removal contracts are now more expensive, and mandatory pay raises combined with the increase in transit subsidy benefits have added to the cost of our day-to-day operations.

Additional funding is being requested for development and technical skills training for staff; to provide uniforms for employees of our Construction Division to ease recognition of staff and

reduce potential security issues within the Capitol complex; to provide training, equipment, materials, and services in preparation for and response to emergency events; and to purchase necessary safety apparel such as hard hats, safety glasses, gloves, steel-toe shoes, and hearing protection for project management staff.

Capitol Visitor Center Operating Budget Request

Our past budget requests for the Capitol Visitor Center (CVC) included funding for its construction. In FY 2010, construction costs are no longer part of our CVC budget. We are requesting \$24.6 million for CVC operations and administration, to include payroll for the Capitol Guides, who have been integrated into our organization, and are an integral part our team. We also are requesting an additional 25 FTEs to support CVC full-year operations to include additional staff to coordinate greater than anticipated requests for use of the CVC rooms and restaurant services, and specialized maintenance personnel to perform furniture repairs and sheet metal repairs in the coat check rooms and the Congressional auditorium.

The mission of the Capitol Visitor Center is to provide enhanced security for all persons working in or visiting the United States Capitol, and a more convenient place in which to learn of the work of Congress and about the Capitol. Since December 2, 2008, when the CVC was officially opened to the public, we have been very successful in achieving our goal to make the visitor experience at the U.S. Capitol one that is safe and enjoyable for all who come here.

Instead of standing in line for hours, visitors now pass through security quickly and are able to enjoy the amenities and the exhibits housed in the CVC. To date, we have welcomed more than 800,000 visitors. In late April, we hosted more than 19,470 guests in a single day, and thanks to the efforts of the U.S. Capitol Police and our Visitor Assistants, the average wait time to enter the facility was six minutes. In addition, every staff-led tour request during this time was accommodated.

As we continue this next year in “test and adjust” mode, Ms. Terrie Rouse, Chief Executive Office for Visitor Services, and her team continue to adapt to changing situations and make accommodations for Members of Congress as necessary. For example, they have made

improvements to the tour schedule and various policies to help Members accommodate constituents who visit their offices who may not have tour reservations. She also has initiated “Congressional staff listening sessions” where staff may share ideas and thoughts about Capitol tour operations.

The Congressional Historical Interpretive Training (CHIP) Program has also been updated since last fall based on feedback from Members’ offices. Our team’s ongoing review of the pilot program’s curriculum since its implementation in fall 2008 has allowed it to grow and improve to meet participants’ needs. Thus far, more than 2,000 Congressional staff have participated in the program. We’re happy to report that the CHIP Program has greatly enhanced the tour experience for Members’ constituents, and that staff-led and Capitol tours have worked in parallel, thereby reducing security risks and optimizing safety concerns of visitor flow within the Capitol Building. Most importantly, the training has successfully met its goal to aid in the accuracy and consistency of the information provided to all visitors.

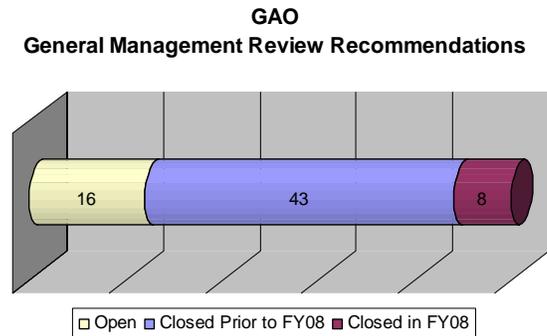
As a point of interest, I would like to add that on April 13, we introduced 50 new documents into the CVC’s Exhibition Hall. The new items, which include the December 11, 1941, resolution declaring war against Germany, one of only two printed drafts of the U.S. Constitution discussed during the 1787 Constitutional Convention, and a list of supplies requisitioned by Meriwether Lewis prior to his historic Lewis and Clark Expedition, will be on display through October 1, 2009.

[AOC Accomplishments](#)

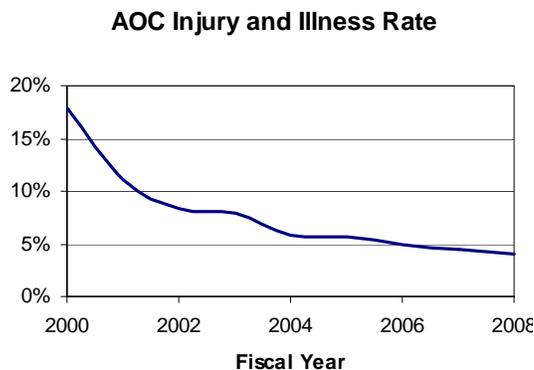
Mr. Chairman, as I discussed earlier, the past year has been one full of significant achievements for the AOC, in addition to the public opening of the Capitol Visitor Center and supporting the Presidential Inauguration. I would like to sum up my testimony by listing a few of our many accomplishments.

- We conducted our annual Building Services Customer Satisfaction Surveys, and in FY 2008, we maintained more than 90 percent customer satisfaction rating. Customer satisfaction continues to increase annually.

- We completed 24 Senate Office moves in April. We also moved 184 House Offices and two House Committees in less than one month's time, and achieved a customer satisfaction level of 96 percent.
- The Government Accountability Office provided the AOC with 67 recommendations to help improve its strategic management since 2003. Nearly 75% of those recommendations have been fully implemented, closed, or incorporated into new recommendations (as of February 2009).
- We continued to improve our cost accounting procedures and internal controls, and received our sixth consecutive clean audit opinion on our financial statements. The Capitol Visitor Center also received a clean audit opinion.
- We conducted employee focus group sessions in April 2008 to gather observations on topics ranging from customer service and internal procedures to our mission and our work environment.
 - Participants noted that the AOC has made tremendous progress over the past few years. Specifically, 54 percent of participants responded that they were satisfied or very satisfied with their jobs versus 35 percent in 2004. Those who said they were very dissatisfied with their jobs dropped from 21 percent in 2004 to just four percent in 2008.



- We decreased our Injury and Illness Rate for 9th year in a row. We dropped to 4.06 cases per 100 employees in FY 2008; the lowest rate the AOC has ever sustained.
- We closed 71 of 99 items from Office of Compliance citations (80%), as of February 2009, and we have submitted a request to close seven additional items.
- United States Botanic Garden (USBG) has achieved accreditation from the American Association of Museums (AAM), the highest national recognition for a museum. Of several hundred public gardens in North America, the U.S. Botanic Garden is one of only 19 that have been awarded accreditation.



- The West Refrigeration Plant Expansion project at the Capitol Power Plant was selected as 2009 Craftsmanship Award Winner in the mechanical category for HVAC-Piping by the Washington Building Congress.
- The Washington Building Congress also recognized the AOC's Painting and Plastering team in the "Specialty Painting" category for relocating the Statue of Freedom model from the Russell Senate Office Building to Emancipation Hall in the CVC.
- Our stone mason team that worked to restore the marble floors in the Jefferson Building, while installing electrical conduits to support the new Visitors Experience project was also recognized by the Washington Building Congress with a 2009 Craftsmanship Award.

Conclusion

Every brick, every floor tile, every element of the U.S. Capitol is saturated with our nation's art, history, and politics, and coming here is one of the best ways Americans can see and understand themselves, their country, and their government.

We are all part of the brick and mortar of our nation, and this Capitol belongs to each and every one of us. For that reason, it is imperative that we do everything we can to succeed in our mission to protect and preserve our nation's icon and a symbol of representative democracy for generations to come.

The AOC is committed to being good stewards of the Capitol complex, and in that regard, we have accomplished much and experienced numerous successes. These achievements can be directly attributed to the dedicated, professional individuals that make up the AOC team. In my role as Acting Architect for the past 26 months, I have been honored and privileged to work along side them. Because of their efforts and commitment to excellence, we continue to provide exceptional service to Congress and the visiting public.

Once again, thank you for this opportunity to testify today. Mr. Chairman, we look forward to working with this Subcommittee, the House Subcommittee on Legislative Branch, and our Oversight Committees to address the backlog of maintenance and repair projects, and continue to protect and preserve the U.S. Capitol for generations to come. I would be happy to answer any questions you might have.