

2011

**USDA Strategic Sustainability
Performance Plan (SSPP)**

USDA
Departmental Management
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Section 1: Policy and Strategy

I. Policy Statement

This policy statement sets forth USDA's commitment to operating in a sustainable manner in compliance with applicable statutes, regulations, and Executive Orders.

USDA is committed to fostering a clean energy economy and to improving the environment by conducting operations in a sustainable and environmentally responsible manner, complying with environmental laws and regulations, and leading by example. USDA's sustainable operations program includes the following areas of emphasis:

- Reducing our reliance on nonrenewable energy by improving energy conservation, increasing efficiency, and promoting renewable energy projects and programs
- Promoting water conservation through identification of water inefficiencies and implementation of water conservation projects
- Implementing sustainable acquisition practices for recycled content, energy efficient, bio-based, and environmentally preferable products and services
- Pursuing waste management strategies that include reducing, reusing, or recycling
- Promoting sound environmental practices for the three life-cycle phases of electronic products: acquisition, operations and maintenance, and end-of-life management
- Supporting green transportation and travel practices that reduce harmful emissions, increase operational and fuel efficiency, and reduce nonrenewable fuel use
- Planning, designing, constructing, and operating facilities that address "whole site" sustainable practices
- Engaging employees, stakeholders, and the public in our environmental commitment

Although USDA has achieved significant successes, we nevertheless face significant challenges in moving forward to improve the sustainability of our operations. One of the biggest challenges involves USDA's geographic diversity—offices in hundreds of locations in all 50 states. Many of these offices are near our customers or stakeholders in rural, remote locations. This diversity presents challenges for reducing greenhouse gas emissions and may limit our alternatives for implementing sustainable practices and technologies. However, these same challenges can foster other opportunities and successes as we work with local communities to reach common goals of sustainability—both in USDA operations and American agriculture.

A recent example of USDA's commitment to environmental leadership is demonstrated through the implementation of a voluntary product certification and labeling program for qualifying biobased products. This new label clearly identifies biobased products made from renewable resources. These products have enormous potential to create green jobs in rural communities, add value to agricultural commodities, decrease environmental impacts, and reduce our dependence on imported oil. In 2010 USDA was very successful in meeting the sustainability goals as outlined in our 2010 Strategic Sustainability Performance Plan (SSPP) and will continue on track to meet our sustainability goals for 2011.

II Sustainability and USDA's Mission

USDA's programs touch almost every American every day. In response to the growing concerns about climate change, greenhouse gases, and depleting natural resources, USDA's mission is designed to create opportunities for farmers, ranchers, forest landowners, public land managers, and families in

rural communities to prosper in new, innovative, sustainable ways while conserving the Nation's natural resources and preventing pollution.

A diverse portfolio and wide range of activities in remote locations presents challenges to agency-directed efforts to monitor sustainable operations goals such as the reduction of energy and water consumption and waste production. At the same time, this diversity offers synergies needed to meet future challenges. Specifically, as global climate change increases, natural resource conservation provides the land with the resilience necessary to maintain productive agriculture, which supports rural communities in a global market. Rural communities, in turn, provide the personal connection to natural resources needed to encourage conservation.

In order to fulfill our mission of providing leadership for food, agriculture, natural resources, rural development, nutrition, and related issues, USDA focuses on the future, recognizing the significance of global climate change and utilizing this knowledge to create and maintain conditions under which humans and nature can exist in productive harmony.

The table below indicates USDA's size and scope of operations.

Size and Scope of Operations	Number	Comments
Total # Employees	110-115,000	
Total Acres Land Managed	193 Million	
Total # Facilities Owned	21,794	
Total # Facilities Leased (GSA lease)	618	
Total # Facilities Leased (Non-GSA)	3,614	
Total Facility Gross Square Feet (GSF)	58,900,000	
Operates in # of Locations throughout U.S.	25,537	Includes 123 locations in US territories
Operates in # of Locations outside of U.S.	3	
Total # Fleet Vehicles Owned	37,798	
Total # Fleet Vehicles Leased	7,231	
Total # Exempted-Fleet Vehicles (Tactical, Emergency, Etc.)	4,353	
Total Operating Budget FY 2010 (\$MIL)	131,000	
Total # Contracts Awarded FY 2010	76,000	
Total Amount Contracts Awarded FY 2010 (\$MIL)	6,065	
Total Amount Spent on Energy Consumption FY 2010 (\$MIL)	69.9	
Total MBTU Consumed per GSF	0.073	
Total Gallons of Water Consumed per GSF	16.1	
Total Scope 1&2 GHG Emissions (Comprehensive) FY 2008 Baseline Million Metric Tonnes of Carbon Dioxide Emissions (MMTCO _{2e})	616,728	
Total Scope 1&2 Greenhouse Gas (GHG) Emissions (Subject to Agency Scope 1&2 Reduction Target) FY 2008 Baseline MMTCO _{2e}	591,942	
Total Scope 3 GHG Emissions (Comprehensive) FY 2008 Baseline MMTCO _{2e}	258,765	
Total Scope 3 GHG Emissions (Subject to Agency Scope 3 Reduction Target) FY 2008 Baseline MMTCO _{2e}	257,069	

I.3 Greenhouse Gas Reduction Goals

In accordance with Executive Order (EO) 13514, "Federal Leadership in Environmental, Energy, and Economic Performance," USDA established a Scope 1 and 2 Greenhouse Gas (GHG) reduction target of 21 percent for 2020, compared to the 2008 base year. To help achieve our reduction target, USDA will focus on reducing energy consumption and increasing renewable energy use in USDA facilities, and on reducing fossil fuel use and increasing alternative fuels use in USDA fleet vehicles. USDA also established a Scope 3 GHG reduction target of 7 percent for 2020, compared to the 2008 base year. To help achieve our reduction target, we will focus on reducing GHG emissions from employee travel, transmission and distribution losses from purchased electricity and contracted waste disposal. As a follow-up to establishing GHG reduction targets and developing a comprehensive GHG inventory, USDA's goal is to maintain and update its GHG inventory in accordance with EO 13514 and the Federal GHG Accounting and Reporting Guidance.

In FY 2011 and FY 2012, USDA anticipates receiving continued benefits from American Recovery and Reinvestment Act (ARRA) projects that were funded and implemented in FY 2010 and discussed in USDA's SSPP last year.

I.4 Plan Implementation

USDA formed a Sustainable Operations Council (SOC) to implement this Plan. USDA's Senior Sustainability Officer (SSO) chairs the SOC and senior executives from each of USDA's seven mission areas comprise core SOC membership. The SOC reviewed and approved the SSPP prior to its submission to the Council on Environmental Quality (CEQ) and Office of Management and Budget (OMB). The SOC will implement the Plan in an organized "management system" manner, incorporating the steps outlined below. The SOC will provide leadership involvement while creating opportunities for employee and USDA agency participation with an overall goal of continual improvement.

The 7 steps of our implementation process are described below.

1) Assessment

The first critical step in the SSPP is to identify and inventory our activities, operations, processes, products, and services, and to determine the associated environmental impacts. Our GHG inventory, completed in January of 2011, plays a major role in determining potential impacts and emphasis areas. In some areas, as described in Section II, USDA has already established baselines, which are used as the foundation to measure progress as we move toward sustainability. In other areas, we are still working on the assessment to create our baseline. Under SOC leadership, USDA will review the effectiveness of the SSPP annually at the Department level, to determine what changes are necessary to ensure we meet our existing goals and look for opportunities for continual improvement.

2) Define Goals and Targets

For those actions that have a potential to cause significant impacts to the environment, the SOC works with respective USDA agencies through membership in SOC workgroups to develop goals and targets for the reduction or elimination of the associated environmental impacts. USDA strives to maintain balance between the life-cycle return on investment to the agency while taking into account economic, environmental, social, and mission-related costs and benefits.

3) Action Plans and Monitoring Plans

Action and monitoring plans developed by the SOC workgroups are implemented at multiple levels throughout USDA. The action plans assist the Department in meeting specific goals and targets by creating milestones and schedules. Monitoring plans measure progress toward meeting sustainability goals.

4) Implementation Initiatives

Each action plan contains implementation initiatives. Implementation initiatives are general actions that, when applied to operations, reduce the Department's impact on the environment. Since USDA agencies are diverse with respect to mission and physical location, the extent and degree to which sustainable initiatives apply or can be implemented at each agency varies. The SOC oversees these initiatives to ensure that EO 13514 goals are pursued aggressively.

5) Monitoring Performance

USDA utilizes a number of methods to monitor performance. Monitoring tools include scorecards, data calls and reports as outlined in Table 1, as well as utility bills and procurement records.

6) Communicate Process

SOC workgroups members periodically update the USDA "greening" website (www.greening.usda.gov) to keep employees and the public updated on progress towards sustainability. The workgroups keep leadership informed through quarterly SOC meetings. Annual updates of our SSPP serve as opportunities to remind employees and the public of the plans, goals, progress and expectations. Section I.4.B describes other methods of communication.

7) Re-assess

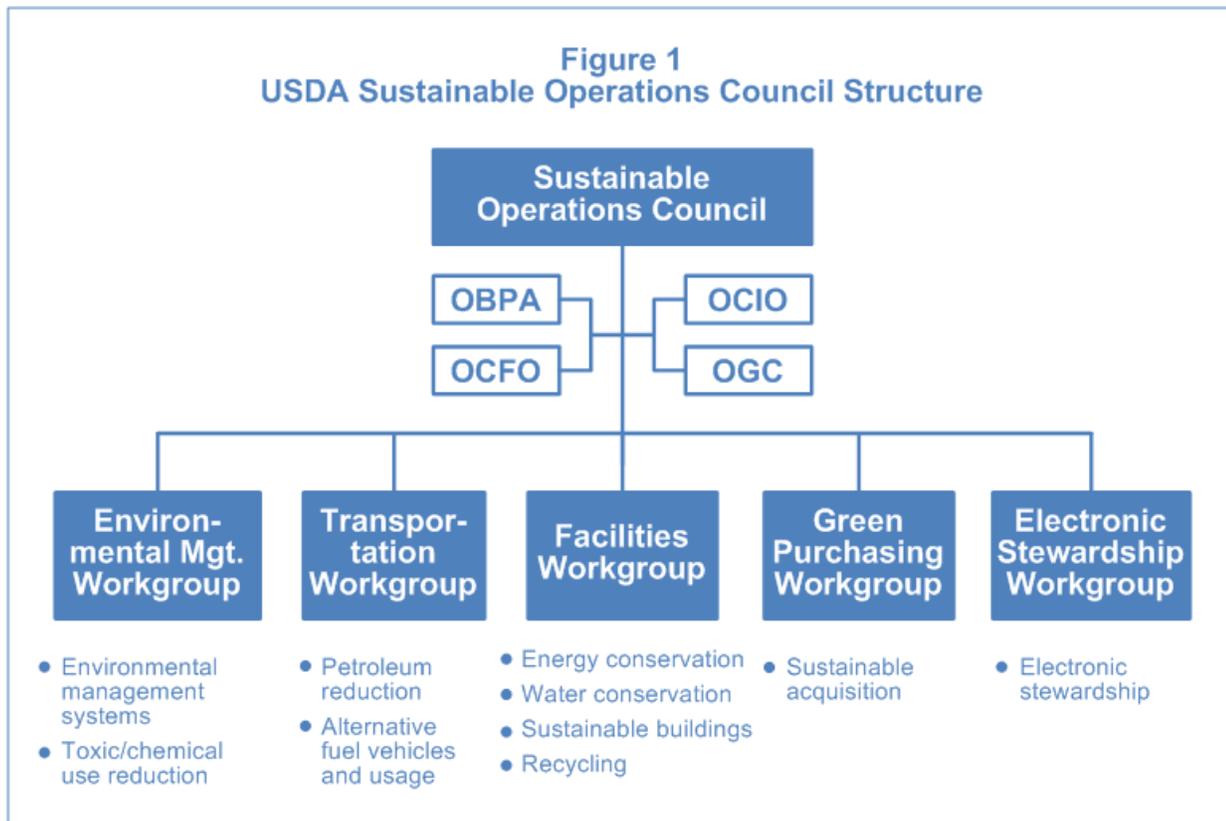
Every year USDA's SOC conducts a performance management review of the results of the year's efforts to monitor compliance with Federal requirements and measures USDA's progress towards sustainability goals. The performance management review provides information needed for continual improvement.

Tie to USDA Agencies' existing Environmental Management Systems (EMS)

While USDA does not have an official Department-wide EMS, the "management system" structure described above is based on core components of an EMS. Currently, the degree to which facility-level and agency-directed multi-site organizational EMSs incorporate the sustainability goals within EO 13514 varies from agency to agency. Because of this diverse approach to EMS implementation, USDA did not address EMS under each EO goal outlined in Section 2 of this plan. Instead USDA continues to endorse integration of EO 13514 sustainability goals into all existing EMSs and provides this "management system" framework to which USDA agencies with existing EMSs can easily connect.

I.4.A Leadership and Accountability

The Secretary of Agriculture designated the Deputy Assistant Secretary for Administration as USDA's Senior Sustainability Officer (SSO) to chair the previously described SOC, whose organization is shown in Figure 1. SOC members include representatives from each USDA mission area and thus represent each of USDA's agencies.



The activities of the SOC are coordinated with the Office of Budget and Program Analysis (OBPA), the Office of Chief Information Officer (OCIO), the Office of Chief Financial Officer (OCFO), Office of General Counsel (OGC), the Senior Real Property Officer, the Real Property Council, and the Procurement Council.

There are five workgroups under the direct leadership of the SOC. Workgroup members serve as key points of contact for day-to-day implementation of USDA sustainability initiatives, and assist in the development of recommendations in the formation of policy, direction and guidance. The workgroup representation includes staff members from the Office of Procurement and Property Management, the Office of Operations, the OCIO, USDA agency headquarters and field office staff.

I.4.B Coordination and Communication

Coordination and communication are critical components in the success of our SSPP. The SOC and representative workgroups play a critical role in coordination and dissemination of information. USDA utilizes the following practices to ensure communication:

- Ensure that agencies and/or Mission Areas have representation on the SOC workgroups
- Post the SSPP on USDA's internet
- Reference the SSPP in critical planning documents such as USDA's Sustainable Buildings Implementation Plan
- Include goals and targets in USDA policy, direction, and guidance documents
- Communicate USDA's progress and accomplishments through usual channels of communication such as meetings, workshops, web sites, newsletters, electronic mail, and internal memos
- Include the contents of the SSPP in upcoming workshops, meetings, and outreach events
- Use the annual update of the SSPP as an opportunity to refresh employee and public awareness of the plan's goals, progress and expectations
- Emphasize the role of employees at the office and at home to help achieve and promote sustainability
- Promote Green Teams, both place-based and virtual, to increase employee awareness and emphasize employees' roles in sustainability

I.4.C Budget and Planning Integration

Currently USDA does not have a separate budget line item to specifically address sustainability. However, in many cases, sustainability is already an integral part of our operations based on USDA policy, guidance, and direction.

Table 1: Critical Planning Coordination¹

The purpose of this table is to illustrate the current relationship between the SSPP and other planning and reporting efforts across the agency.

Originating Report / Plan	Scope 1 and 2 GHG Reduction	Scope 3 GHG Reduction	Develop and Maintain Agency Comprehensive GHG Inventory	High-Performance Sustainable Design / Green Buildings	Regional and Local Planning	Water Use Efficiency and Management	Pollution Prevention and Waste Elimination	Sustainable Acquisition	Electronic Stewardship and Data Centers	Agency Specific Innovation
GPRA Strategic Plan	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Agency Capital Plan	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	NA	NA
A-11 300s (major investments e.g. data centers)	Yes	Yes	Yes	NA	NA	NA	Yes	Yes	Yes	NA
Annual GHG Inventory and Energy Data Report	Yes	Yes	Yes	Yes	NA	Yes	NA	Yes	Yes	NA
EISA Section 432 Facility Evaluations/Project Reporting/Benchmarking	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	NA	Yes
Budget Process	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	NA
Asset Management Plan/3 Year Timeline	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	NA	NA
IT - Circular A-11 Exhibit 53s (annual IT expenses)	Yes	Yes	Yes	NA	NA	NA	Yes	Yes	Yes	NA
OMB Scorecards	Yes	Yes	Yes	Yes	NA	Yes	Yes	Yes	Yes	NA
DOE's Annual Federal Fleet Report to Congress and the President	Yes	Yes	Yes	NA	NA	NA	NA	Yes	NA	NA
IT - Data Center Consolidation Program	Yes	Yes	Yes	NA	NA	NA	Yes	Yes	Yes	Yes
Environmental Management System	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Instructions for implementing Climate Change Adaptation Planning	No	No	No	No	No	No	No	No	No	No
Sustainable Procurement Plan	No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes
Electronics Stewardship Plan	Yes	Yes	Yes	Yes	No	No	Yes	Yes	Yes	Yes

¹ Yes = Integrated; No = Not integrated; NA = Not applicable

I.4.D Methods of Evaluation

Every year USDA's SOC conducts a performance management review of the results of the year's efforts to monitor compliance with Federal requirements relating to sustainability and measure USDA progress towards sustainability goals. This review process allows USDA to continuously improve sustainability efforts. To the extent that quarterly and biannual monitoring data are available, such data is included in annual reviews.

I.5 Evaluating Return on Investment

The extent to which USDA prioritizes projects, initiatives, and efforts based on lifecycle return on investment varies significantly. For example, USDA facility managers regularly evaluate lifecycle return on investment for energy and water conservation projects, which are accomplished by energy savings performance contract (ESPC) or utility energy services contract (UESC). In these instances, facility managers typically establish criteria for payback time associated with return on investment and select projects that meet or exceed those criteria. By contrast, other types of USDA procurement actions may not receive evaluations on lifecycle return on investment. Decisions on product purchases often do not include such analyses. A major challenge in having procurement officials perform such analyses is the organizational separation of costs and benefits. If a product has a higher initial price but results in lower disposal costs at end of life, the purchaser may not place a high priority on this attribute if another part of the organization pays for disposal.

Consideration of costs and benefits varies by USDA mission area. Agencies under the Natural Resources and Environment mission area are highly attuned to the environmental costs and benefits associated with their activities. Similarly, agencies associated with Rural Development, Food Safety, Farm and Foreign Agricultural Services, and Food Nutrition and Consumer Services are highly attuned to social costs and benefits, including harm to future generations and international impacts. USDA decision-makers typically consider non-quantifiable benefits in both environmental and social arenas. The decision to fund and establish the People's Garden, for example, took its symbolic value into account. As a living exhibit of what USDA does every day, the Garden incorporates sustainable practices, is a collaborative effort, and benefits the community. One year after the decision, there are more than 300 Peoples' Gardens designated throughout the country, which certainly represents an excellent return on investment.

USDA is beginning to incorporate the use of behavioral economics into its decision-making. Some of that thinking is reflected in our SSPP. For example, our discussion of Goal 6 – Sustainable Acquisition in Section 2 of the Plan indicates that USDA will not achieve sustainability in 95 percent of contracts by 2011. A major factor associated with the longer schedule for achieving this goal is the time it takes to overcome the human inertia of continuing current procurement processes and habits.

Concerned about the risks of climate change to agriculture and forestry, USDA established a Climate Change Program Office within the Office of the Chief Economist some years ago. This Office functions as the Department-wide coordinator of agriculture, rural and forestry-related global change program and policy issues facing USDA. The Office ensures that USDA is a source of objective, analytical assessments of the effects of climate change and proposed response strategies. The Office also serves as USDA's focal point for climate change issues and is responsible for coordinating activities with other Federal agencies, interacting with the legislative branch on climate change issues affecting agriculture and forestry, and representing USDA on U.S. delegations to international climate change discussions.

I.6 Transparency

USDA is committed to clearly communicating the progress of our SSPP both within USDA and to the public.

Internal Transparency

USDA utilizes the following methods to facilitate internal communication: (1) Green Teams; (2) outreach events; (3) newsletters; (4) the Internet; (5) training and workshops; and (6) memos, email and voice messages from the Secretary.

SOC workgroups provide quarterly updates and an annual progress report to the SOC, including: (1) fiscal year progress towards USDA's sustainability goals; (2) success stories to facilitate internal networking; and (3) an analysis of any barriers or issues that may impede performance.

Annual progress reporting provides senior management with the information needed to analyze and alter strategies. The SSPP is updated accordingly to ensure continual success for subsequent years. The annual report also provides the information needed to report our progress to OMB and CEQ.

External Transparency

In addition to posting stories and articles on an ongoing basis, USDA posts key documents relating to SSPP targets. USDA uses "social media" to connect with people in ways that are the most convenient and effective for them. For some, the most convenient way is to read information directly on our Web site; others might prefer audio or video casts. USDA utilizes blogs, Facebook, Flickr, Podcasts, RSS (Really Simple Syndication) feeds, Twitter, Widgets, and YouTube to increase awareness of USDA's programs.

Section II: Performance Review and Annual Update

II.1 Summary of Accomplishments

This section highlights some of USDA's recent accomplishments in key EO 13514 goal areas.

Scope 1 and 2 Greenhouse Gas Emissions Reduction

USDA has made significant progress in recent years in improving energy efficiency and renewable energy use performance. In FY 2010 USDA achieved statutory goals and policy requirements relating to energy intensity reduction, renewable energy use, advanced electric metering, energy evaluations, and alternative financing. USDA achieved a 15.9 percent reduction in energy intensity compared to the FY 2003 baseline. USDA purchased and consumed renewable energy equivalent to 9.2 percent of the Department's total electricity use.

Scope 3 Greenhouse Gas Emissions Reduction

In FY 2010, USDA continued to focus our efforts on reducing GHG emissions from employee travel, contracted waste disposal, and transmission and distribution losses from purchased energy. Subsequently, in FY 2010, USDA achieved a 5.1 percent reduction in Scope 3 GHG emissions compared to the FY 2008 base year.

Water Conservation

USDA has made significant progress in recent years in improving its water use efficiency and management performance. In FY 2010, USDA achieved statutory goals and policy requirements relating to water use intensity reduction. USDA reduced its potable water use intensity by 14.1 percent compared to the FY 2007 baseline; and established the Department's industrial, landscaping, and agricultural water use baseline.

Sustainable Buildings

In FY 2010, USDA measured 5.5 percent of its buildings as sustainable, after assessing a little less than half of all buildings over 5,000 gross square feet. At present, agencies are furthering the assessment process to benchmark, measure, and validate performance of existing buildings. Assessments evaluate the extent to which buildings meet the Guiding Principles. In 2011, USDA continues to implement strategies to achieve its sustainable buildings goals and USDA agencies come closer to estimating the required resources.

Waste Reduction and Recycling

In FY2010, USDA established a nationwide network of buildings to provide waste and recycling data, and implement waste management best practices. USDA-occupied, Government-owned buildings achieved a 45 percent waste diversion rate in FY2010.

Sustainable Acquisition

A key component of a sustainable acquisition program is awareness training. In this regard, USDA developed an online training course that covers the six required product categories and posted the training in FY2010 to AgLearn, USDA's official online training program. In FY2011, the BioPreferred Program launched a voluntary labeling program, in which companies and vendors may obtain a USDA-certified biobased label for qualified products and packaging.

Electronic Stewardship

USDA's Data Center Consolidation Plan, approved by OMB in August 2010, establishes a timeline for consolidation of the current data centers from 46 to five by FY2015. USDA is also moving some services to a cloud platform, an activity that further reduces USDA's need for additional hardware, building space, and energy. USDA is already taking advantage of multiple cloud-based computing services, including for content delivery networks and e-mail applications.

Environmental Management Systems

USDA currently has 130 facility-level environmental management systems (EMSs) and one multi-site EMS, which addresses 142 additional facilities. USDA agencies will continue to utilize EMSs to ensure environmental compliance and pursue progress on the sustainability goals.

II.2 Goal Performance Review

Goal 1 – Scope 1 and 2 Greenhouse Gas Reduction

Description and Objectives

In accordance with EO 13514, USDA established a Scope 1 and 2 greenhouse gas (GHG) emissions reduction target of 21 percent in FY 2020, compared to the FY 2008 base year. To help achieve our reduction target, we will focus efforts on reducing energy consumption and increasing renewable energy use in USDA facilities; reducing fossil fuel use and increasing alternative fuels use in USDA fleet vehicles; and reducing per capita energy consumption through space management policies.

Objective 1 – Decrease Energy Intensity

Reduce energy intensity by 37.5 percent by FY 2020, compared to the FY 2003 base year.

In FY 2010, USDA achieved a 15.9 percent reduction in energy intensity compared to the FY 2003 base year. The reduction target of 37.5 percent by FY 2020 assumes that USDA will meet the Energy Independence and Security Act's 30 percent energy intensity reduction goal in FY 2015; while reducing energy intensity by an additional 1.5 percent per year from FY 2016 to FY 2020.

Objective 2 – Increase Use of Renewable Energy

Purchase and generate renewable energy equivalent to at least 10 percent of the Department's total electricity use by FY 2020.

In FY 2010, USDA purchased and generated renewable energy equivalent to 9.2 percent of the Department's total electricity use. USDA has established a target of purchasing and generating renewable energy equivalent to 10 percent of total electricity use by FY 2020.

Objective 3 – Reduce Per Capita Energy Consumption through Space Management Policies

Reduce USDA's space inventory by 1 million square feet by FY 2012, compared to FY 2009.

USDA exceeded its space inventory reduction goal for FY 2010 by 83 percent for a total reduction of 972,267 square feet, compared to FY 2009 figures.

Objective 4 – Reduce Petroleum Use in Fleet Vehicles

Reduce covered Federal fuel consumption by 2 percent annually for a total reduction of 30 percent from FY 2005 to FY 2020. Reduce annual fleet fuel consumption by 451,989 GGEs by FY 2020.

USDA consumed 17,931,915 GGEs of covered petroleum in FY 2010 and did not achieve the annual 2 percent reduction goal mandated in the transportation related regulations. The petroleum reduction target goal for FY 2010 was 16,617,552 GGEs. Initiatives are in place, however, that will place USDA back on course to achieve the 20 percent petroleum reduction goal by 2015 (as directed by EO 13423) and the 30 percent petroleum reduction goal by 2020 (in accordance with EO 13514).

In FY 2008, USDA's motor vehicle covered Federal fuel consumption was 2,162 Billion British Thermal Units (BTUs). Our FY 2020 covered Federal fuel consumption reduction target is 1,608 Billion BTUs. The FY 2020 target assumes that USDA will meet the requirements of EO 13514, EO 13423, and Energy Independence and Security Act (EISA) Section 142.

Objective 5 – Increase Use of Alternative Fuels

Increase use of alternative fuels in fleet alternative fuel vehicles and flex-fuel vehicles in locations where alternative fuel is available.

The FY 2005 USDA alternative fuel consumption baseline is 196,642 GGEs. The annual alternative fuel consumption by FY 2020 is forecasted at 2,175,880 GGEs, an increase of 1007 percent as compared with FY 2005. This substantial increase is based on several viable initiatives that have been instrumental in escalating the use of alternative fuel over the past several years.

Objective 6 – Increase Use of Low Emission/High Fuel Economy Vehicles

This objective will be accomplished through the acquisition of low emission and high fuel economy vehicles.

Fuel Economy vehicles are projected to increase the overall miles per gallon (mpg) rate in the USDA fleet from 23.5 in FY 2010 to 29 mpg in FY 2020. USDA motor vehicle fleet reviews have determined that the vehicle acquisition process varies substantially from year to year. The vehicle acquisition (owned, commercially leased, General Services Administration (GSA) leased) rate could total 6,000 vehicles in any given year and decline to 4,000 vehicles the next.

Light duty vehicles leased from GSA (such as sedans) are generally replaced every three to four years. However, USDA-owned vehicles are replaced anywhere from every six to 10 years. Also, the USDA Forest Service (FS) operates under a working capital fund and may replace owned vehicles more frequently than other USDA agencies. The strategy for accomplishing this objective takes into account the vehicle acquisition variance when determining the annual number of vehicles required to reach the 30 percent petroleum reduction goal by FY 2020.

Objective 7 – Replace Conventional Senior Executive Fleet

Plans are in place to convert our executive vehicle fleet to low-GHG emitting, highly-efficient vehicles by employing 100 percent E85 flexible fuel and hybrid vehicles by the end of FY 2011.

USDA currently operates nine vehicles which serve senior executives. Only two of these vehicles were reported as petroleum vehicles. USDA's goal is to fully comply with the transportation mandates set forth by EO 13423, EO 13514, and EISA.

Objective 8 – Streamline Shuttle Bus Service

Streamline existing shuttle bus routes by consolidating ridership with other agencies. Identify specific challenges related to consolidation of and/or sharing of transportation services with other agencies.

USDA operates shuttle services that travel throughout the Washington area. Frequently, employees must travel to USDA offices located in Maryland and Virginia which are not within close proximity to public transportation. Employees may ride the Metro to reach most of these locations; however, shuttle services are needed to transport the employees from the Metro to USDA facilities. Challenges for consolidating shuttles between Departments/Agencies include the need for additional collaboration from GSA to provide opportunities that meet USDA requirements.

The FS has conducted a comprehensive space assessment in the D.C. area that could include consolidation of FS leases; eliminating the need for their shuttle service. The shuttle produces 22 metric tons of CO₂e each year. This involves one route and is essentially beneficial to the FS. This effort would assist the Department with reducing greenhouse gases but the need for shuttle services for other USDA agencies is paramount due to the location of many USDA facilities.

Leadership

The USDA SOC, which is chaired by the USDA SSO, is responsible for overseeing the overall objectives and goals of EO 13514. There are five workgroups under the direct leadership of the SOC: Environmental Management, Transportation, Facilities, Green Purchasing, and Electronic Stewardship. The Facilities Workgroup and the Transportation Workgroup serve as the key points of contact for day to day implementation of the USDA Scope 1 and 2 GHG emissions reduction initiatives.

Implementation Methods

USDA will rely on the organizational structure and resources of the SOC to implement measures to facilitate compliance with EO 13423 and EO 13514. The efforts of the SOC are supported at the national level by groups such as the USDA's Real Property Council and Procurement Council, as well as various workgroups and employee Green Teams at the regional and field levels. USDA Green Teams are groups of employees, regardless of discipline or organizational level, specifically chartered by leadership to promote and foster sustainable operations that reduce a unit's environmental footprint.

USDA will continue to integrate its strategic plans and policies with the services provided by the Federal Energy Management Program (FEMP) to create effective management tools and energy initiatives to achieve its Scope 1 and 2 GHG Reduction Target by FY 2020. USDA planned implementation initiatives will incorporate provisions from various USDA policies and plans including: Departmental Regulation 5500-001; the USDA Utilities Metering Guidance; the USDA Renewable Energy Guidance; USDA's EMSs; and the fleet management policies mandated in the Agriculture Property Management Regulations.

Examples of management tools/strategies that USDA plans to use to achieve this goal include Department of Energy (DOE) sponsored Energy Savings Performance Contracts (ESPCs) and Utility Energy Service Contracts (UESCs), green power purchase agreements, purchasing Renewable Energy Certificates (RECs), awards programs, performance evaluations, training; metering and Life Cycle Cost Analyses. Viable fleet management related strategies will be developed through the USDA Internal

Motor Vehicle Tool. This tool will also be used as a management tool to perform fuel use audits, acquire Alternative Fuel Vehicle (AFV) or fuel efficient vehicles in specific locations nationwide, and pinpoint AFVs that can use alternative fuel all of the time. In addition, USDA will be able to map alternative fueling locations for vehicles with critical travel related mission requirements that correspond with their travel routes.

Other tools/strategies include utilizing internal USDA Agency scorecards and corporate data management systems. Specific initiatives that USDA will employ entail increasing the use of alternative transportation fuels, procuring more energy efficient replacement vehicles, “right-sizing” vehicles to perform critical mission requirements, implementing vehicle utilization strategies, performing facility energy audits, disseminating “*You Have the Power*” campaign materials, and strategically reducing space inventory.

USDA’s comprehensive GHG inventory, which was developed in January 2011, will better inform the decision making and implementation process under this goal. Achieving this goal will also help the Department comply with the High Performance and Sustainable Buildings Guiding Principles in Goal 3. Also, we anticipate that synergies will be achieved between this Goal and Goals 2 and 6, due to the similar implementation strategies that USDA plans to employ in attaining these respective goals.

Specific implementation initiatives and programs

1) Life-cycle Cost Analysis

Use life-cycle cost methodologies and value engineering to identify cost-effective opportunities to improve energy efficiency, use renewable energy, and reduce petroleum fuel use in facilities and fleet operations. Consider the life-cycle costs of combinations of projects, particularly to encourage bundling of energy-efficiency projects with renewable energy projects.

2) Energy Audits and Efficiency Improvements

- Conduct energy audits of EISA Section 432 Covered facilities for energy efficiency and to expand the use of renewable energy and technologies, to the greatest extent possible, subject to available funding. As evaluations are completed, continue to identify and implement projects that improve energy efficiency and offer potential use of renewable energy and technologies.
- Include an energy analysis during the design phase of renovation projects to identify potential energy efficiency opportunities.
- Consider new energy conservation technologies in appropriate repair and construction projects.
- Initiate early retirement of older, inefficient appliances and other energy using equipment.
- Switch to less greenhouse gas-intensive, non-petroleum energy sources, such as natural gas or renewable energy sources, and decrease unnecessary fuel use through efficiency projects.
- Pursue combined heating/cooling/power systems projects, when life-cycle cost effective. Target facilities for combined heating/cooling/power systems where there is a high demand for hot water or cooling for process needs and where low cost fuel (such as natural gas or biomass) are readily accessible.

3) Alternate Financing Mechanisms

- Promote the use of ESPC and UESC, when life-cycle cost effective, to help finance energy efficiency and renewable energy projects.

- Utilize audit reports to identify potential sites for energy savings performance contracts and/or utility energy service contracts.

4) Distributed Generation

- Use solar and other renewable technology, particularly at remote locations, where it competes favorably with traditional power systems.
- Incorporate solar power to run pumps and exhaust fans at recreation sites.
- Utilize wind power at selected facilities.

5) Electrical Load Reduction

- Remain accountable and responsible electrical power consumers.
- Coordinate with utility companies to minimize overall use of electricity and manage electricity consumption during emergencies.

6) Metering

Continue to install advanced meters, whenever life-cycle cost effective. By utilizing advanced metering technologies, USDA will obtain the information needed to meet energy goals, save money, and improve the Department's building operations.

7) Training, Awareness, and Recognition

- Raise the level of participation and visibility of USDA in government-wide energy and transportation management initiatives while increasing the awareness of these initiatives within the Department.
- Continue to disseminate "You Have the Power" campaign awareness information to facility managers, energy managers, and fleet managers; and promote awareness, education, and training of energy and transportation requirements through the USDA Sustainable Operations Website.
- Encourage appropriate personnel to attend training programs and workshops provided by the Federal Energy Management program, private and public institutions, and other Federal agencies.
- Sponsor the GovEnergy 2011 and encourage employees' participation in the annual conference.
- Promote employee commitment to improving energy efficiency through awards and recognition programs.
- Participate in the Annual Federal Energy and Water Management Awards program and the "You Have the Power" recognition program; Submit FY 2011 nominations to recognize outstanding energy efficiency and renewable energy use efforts.
- Encourage and support specific employee award and recognition programs that cover a broad-range of categories, including energy efficiency and conservation.

8) Monitoring and Accountability

- Develop a USDA scorecard to track USDA agencies and staff offices progress in executing the Department's initiatives relating to this goal.
- Incorporate energy management responsibilities as an element in position descriptions and performance evaluation standards of its personnel (e.g., facility managers, area and location engineers, building engineers, maintenance mechanics, energy managers, engineering project managers, and procurement personnel) considered being critical to the implementation of this goal.

9) Space Management

- Review Departmental Regulation (DR) 1620-002, “USDA Space Management Policy” to determine need for more prescriptive space requirements; increase emphasis on cost-saving strategies such as telework, office and workstation “hoteling,” and employing energy efficient interior design practices. Encourage agencies to closely correlate space functions with needs and utilize electronic means of information storage and distribution to minimize the amount of space dedicated to filing, mail and libraries to the greatest extent practical.
- Analyze opportunities for sharing space with other agencies or offices, such as, mobile space, county service space (e.g. public libraries) and leased or GSA assigned space. Encourage agencies to identify telework opportunities when planning space assignments to reduce office footprints and encourage space sharing.
- Promote teleworking as part of cultural transformation to create an inclusive, high-performance organization. USDA’s Work-Life Program Manager is developing a Department-wide telework program that, when fully implemented over the course of approximately 4 years, will result in significant real property cost savings. A draft Business Case for mobilizing USDA’s workforce and customer service was developed in March 2011.
- Conduct systems analysis of USDA’s Corporate Property Automated Information System (CPAIS) to determine changes needed to match any Federal Real Property Profile (FRPP) system changes and any fixes/changes needed to provide proper reports, data analyses, etc. FRPP has 11 new data elements this year, so work is underway to modify CPAIS and instruct the agencies on how to submit the required data.
- Conduct analysis of real property data integrity to determine outliers, data anomalies, etc., to focus on data cleanup – verifying and validating our data. In early 2011, the Office of Procurement and Property Management (OPPM) identified severe operating cost anomalies associated with excess properties and took action to correct the data. (This review involved the Forest Service’s Midewin National Tallgrass Prairie in Illinois).
- Analyze GSA and commercial lease space locations to determine geographic proximity to each other within a reasonable distance. In early 2011, OPPM and the GSA shared leasing data and created a map that reflects both GSA and USDA leased property locations. This enhances our ability to visualize and plan collocation/consolidation opportunities and save on leased property costs.
- Further the Geospatial database initiative. This will enable USDA to search for underutilized spaces within a designated radius to analyze opportunities for collocation and cost savings.
- USDA is in the process of consolidating distributed server workload and server rooms (Data Centers) to achieve an estimated \$75 million in savings over a five-year period (FY 2009-2013), including approximately \$60 million during FY 2010-2012. These amounts include operational cost savings for utilities, information technology hardware and software, and personnel reductions.

Positions

USDA anticipates that it will utilize current staffing to support the development and implementation of the Department’s Scope 1 and 2 GHG Reduction initiatives. A substantial portion of the work will be performed as a collateral duty.

Planning Table

	SCOPE 1&2 GHG TARGET	Unit	FY 10	FY 11	FY 12	FY 13	FY 14	FY 15	..	FY 20
Buildings	Energy Intensity Reduction Goals (BTU/SF reduced from FY03 base year)	%	15	18	21	24	27	30	..	30
	Planned Energy Intensity Reduction (BTU/SF reduced from FY03 base year)	%	15.9	18	21	24	27	30	..	37.5
	Renewable Electricity Goals (Percent of electricity from renewable sources)	%	5	5	5	7.5	7.5	7.5	..	7.5
	Planned Renewable Electricity Use (Percent of electricity from renewable sources)	%	9.2	10	10	10	10	10	..	10
Fleet	Petroleum Use Reduction Targets (Percent reduction from FY05 base year)	%	10	12	14	16	18	20	..	30
	Planned Petroleum Use Reduction (Percent reduction from FY05 base year)	%	10	12	14	16	18	20	..	30
	Alternative Fuel Use in Fleet AFV Target (Percent increase from FY05 base year)	%	61	77	95	114	136	159	..	159
	Planned Alternative Fuel Use in Fleet AFV (Percent increase from FY05 base year)	%	79	180	220	261	339	418	..	1007
Senior Executive Fleet Replaced with Low-GHG, High Efficiency Vehicles (Percent replaced from FY08 base year)	%	78	100	100	100	100	100	..	100	
	Total Scope 1&2 GHG Emissions (Comprehensive)	MMT CO2e	634,981	582,808	571,090	559,989	548,888	537,170	...	489,682
	Total Scope 1&2 GHG Emissions (Subject to Agency Scope 1&2 GHG Reduction Target)	MMT CO2e	608,763	559,385	548,138	537,483	526,828	515,581	...	470,002
	Overall Agency Scope 1 & 2 Reduction (reduced from FY08 base year)	%	-2.8	5.5	7.4	9.2	11	12.9	..	20.6

Status

USDA has made significant progress in recent years in improving its energy efficiency and renewable energy use performance. In FY 2010, USDA achieved statutory goals and policy requirements relating to energy intensity reduction, renewable energy use, advanced electric metering, energy evaluations, and alternative financing.

Recent performance and initiatives

1) Energy Reduction and Renewable Energy Use

- In FY 2010, USDA established its Scope 1 and 2 GHG Reduction Target and began development of its inventory of Scope 1 and 2 GHG emissions in accordance with EO 13514.
- In FY 2010, USDA's energy use index (EUI) was estimated at 72,525 British thermal units (Btu) per gross square foot (GSF), which represents a 15.9 percent reduction compared to the FY 2003 baseline of 86,281 Btu per GSF. The FY 2010 EUI reduction goal for the Energy Policy Act (EPACT) was 10 percent (as compared to the FY 2003 baseline); and the FY 2010 reduction goals for EISA and EO 13423 were both 15 percent (as compared to the FY 2003 baseline). Accordingly, USDA exceeded all three of these goals.
- USDA agencies strived to select products, materials, and systems that maximize the use of renewable energy. We gave appropriate consideration to incorporating solar, wind, and other renewable technologies when cost-effective over the life cycle. Accordingly, through a combination of purchases and on-site generation, USDA used approximately 51,543 megawatt-hours (MWH) of renewable energy, which is equivalent to 9.2 percent of USDA's total electricity use for FY 2010. Thus, USDA exceeded the EPACT renewable energy use goal of 5 percent for FY 2010.
- Conducted energy evaluations for at least 50 percent of its covered facilities in accordance with EISA Section 432.
- Updated USDA Advanced Metering Plan and Guidance to include natural gas and steam and completed all of the milestones in its Electric Metering Plan. All USDA facilities within the National Capital Region have advanced electric meters installed. Approximately 3,535 of USDA buildings nationwide are metered for electricity either internally or by local utilities. This figure represents about 98 percent of USDA's total electricity use. Approximately 614 of USDA buildings (representing 84 percent of USDA's natural gas use) are metered for natural gas and 17 buildings (representing 41 percent of USDA's steam use) have steam meters installed.
- USDA achieved a Green rating for status and progress on energy intensity reduction and renewable energy use on the FY 2010 OMB Scorecard on Sustainability/Energy.
- Updated USDA Renewable Energy Guidance to incorporate provisions contained in EO 13514.
- Participated in Federal Energy Management Program (FEMP) First Thursday Seminars.
- As part of the Department's ongoing facilities modernization, repair, and maintenance activities, USDA spent more than \$ 5.5 million for related building energy efficiency improvement projects.
- USDA's Departmental Management continued to execute its UESC with Washington Gas Energy Services. The UESC, which was awarded in FY 2007, is a ten year contract for \$10 million and covers the USDA HQ Complex and the George Washington Carver Center (GWCC). The HQ Complex and GWCC (located in Beltsville, Maryland) contain more than three million GSF of mixed use office space. The first phase of the UESC contract will

provide over 2,300 megawatt-hours of electrical savings and \$250,000 in cost savings annually.

- USDA agencies continued to pursue ESPC opportunities. Specifically, agencies reviewed data from EISA Section 432 energy evaluations to determine the cost-effectiveness of employing ESPCs or UESCs as a follow-up to the site evaluations. USDA realized energy and cost savings from the following ESPCs that were initiated in previous fiscal years as shown in the table below.

Energy Savings Performance Contracts			
Facility	Location	Annual Cost Savings	Description
Center for Medical, Agricultural and Veterinary Entomology	Gainesville, Florida	\$44,665	Awarded in FY 2009
Multiple Facilities - Agricultural Research Service (ARS)	Texas	\$510,000	Awarded in FY 2009
Beltsville Agricultural Research Center	Beltsville, Maryland	\$767,935	Awarded in 2003
National Agricultural Library	Beltsville, Maryland	\$143,546	Awarded in 2000 and includes: lighting retrofits, burner replacement, chiller plant automation, and building automation systems
National Animal Disease Center	Ames, Iowa	\$759,956	Awarded in 1999 under the DOE Mid-West Area Super ESPC
Forest Service Forestry Laboratory	Corvallis, Oregon	See description	Awarded in 1999. The focus of the ESPC is on heating retrofit and building automation systems; has achieved more than \$650,000 in cumulative savings.

2) Space Management

- USDA exceeded its space inventory reduction goal by 83 percent for a total reduction of 972,267 square feet.
- USDA's Animal and Plant Health Inspection Service (APHIS) disposed of (demolished) a \$1.3 million Fruit Fly Rearing Facility in Hawaii.
- USDA's Food and Nutrition Service (FNS) closed a Chicago Field Office for a cost savings of \$25,116.

Planned initiatives for FY 2011 and beyond

1) Energy Reduction and Renewable Energy Use

- Perform energy evaluations for at least 75 percent of USDA "Covered Facilities" in accordance with EISA Section 432 requirements (Completed June 30, 2011).
- USDA agencies will continue to pursue ESPC opportunities. Specifically, agencies will review data from FY 2011 EISA Section 432 energy evaluations to determine if it will be cost effective to employ ESPCs or UESCs as a follow-up to the site evaluations (Current review will be completed by December 31, 2011).
- Completed scheduled actions in USDA Advanced Metering Plan; specifically, continue installations of advanced metering at priority USDA facilities (October 1, 2012).

- Review preexisting modernization designs for energy efficiency improvements at select USDA facilities.
- Develop USDA Agency Scorecards on Sustainability/Energy, and track agencies' progress (Completed September 30, 2011).
- Participate in FEMP First Thursday Seminars (On-going).

2) Space Management

- Continue to explore opportunities related to reducing operating costs (including regular and overtime utilities) and leasing costs. Focus will be on increasing energy conservation, consolidating field structure, and teleworking.
- Continue to utilize existing leased space to collocate employees from different program areas instead of increasing its leased portfolio.
- NRCS is conducting a review of owned assets (primarily the Plant Materials Centers) to assess condition and better manage deferred maintenance, utilization, and energy/sustainability. NRCS is reviewing space at its National HQ and Beltsville locations to improve space utilization and updating its telework policy to lower real property costs and greenhouse emissions by reducing employee commuting, daily facility operations, and building occupancy loads.
- ARS has proposed the closure of 10 locations in FY 2012.
- NRCS will work with GSA to perform Targeted Asset Reviews (TAR) to improve the utilization and disposal of real property. NRCS is collocated with one or more USDA agencies in over 2,300 of its more than 3,200 locations. NRCS is assessing opportunities for additional collocation, office closures and reducing space.
- FS will continue to use the FS Facility Realignment and Enhancement Act (FSFREA) for a reduction of infrastructure where appropriate.
- FNS is making every effort to collocate offices, reduce space and monitor GSA rent bills to ensure that charges are accurate.

3) Fleet Transportation Management:

- Identify viable USDA locations for installation of ethanol blender pumps
- Identify opportunities to reduce petroleum through fleet and vehicle right sizing that equate to 11 percent of the FY 2005 baseline and that could be accomplished by December 2012.
- Develop plan to use 275,000 GGEs by December 2012 which will be based on the conversion of diesel tanks to tanks capable of using B20 biodiesel.
- Reevaluate USDA critical mission areas nationwide to determine locations where critical masses of vehicles operate (50 to 100 vehicles). The goal is to reduce petroleum consumption and increase AF use by possible infrastructure development and partnership with other Federal, state, local, and private entities.
- Work with Clean Cities of DOE and FEMP to identify high density USDA AFV areas to increase the use of alternative fuel.
- Develop Department-wide plan to right-size entire USDA fleet to achieve optimum fuel efficiency and match AFV mission related travel with critical mission requirements.
- Revise and/or modify the USDA comprehensive Petroleum Reduction Strategy to ensure USDA is on target to achieve FY 2015 and FY 2020 transportation related goals relative to petroleum and green house gas reductions and alternative fuel use increases.
- Exchange 100 percent of selected petroleum vehicles with flexible fuel vehicles identified in rural areas. This vehicle exchange will provide for the maximum use of alternative fuel and will enhance the USDA fleet efficiency.

- Develop draft comprehensive USDA petroleum reduction strategy based on agency specific petroleum reduction initiatives by the end of the first quarter of FY 2012.
- Review and modify Agriculture Property Management Regulations to update guidance and implement procedure to assist USDA fleets with regulatory compliance, effective motor vehicle fleet efficiency processes, petroleum reduction, and alternative fuel increases.
- Evaluate NRCS and ARS diesel tanks to determine the number of tanks feasible for B20 biodiesel conversion.

Additional highlights

In collaboration with DOE National Laboratories, USDA conducted two renewable energy studies and performed three energy reviews (at select USDA facilities) using ARRA funds channeled through FEMP. The ARRA funds were also used to conduct energy auditing training for USDA energy managers and prepare a Guidebook for Development of Wind Energy on National Forest lands.

Goal 2 – Scope 3 Greenhouse Gas Reduction & Develop and Maintain Agency Comprehensive Greenhouse Gas Inventory

Description and Objectives

In accordance with EO 13514, USDA will reduce Scope 3 GHG emissions.

Objective 1 – Reduce Scope 3 GHG Emissions

Reduce Scope 3 GHG emissions by 7 percent by 2020, compared to the 2008 base year.

To help achieve our reduction target, USDA will focus our efforts on reducing GHG emissions from USDA employee travel, contracted waste disposal (i.e., solid waste disposal and wastewater treatment), and transmission and distribution (T&D) losses from purchased energy. In FY 2010, USDA achieved a 5.1 percent reduction in its Scope 3 GHG emissions compared to the FY 2008 base year.

Objective 2 – Management of Comprehensive GHG Inventory

Develop and maintain a Department-wide comprehensive greenhouse gas inventory in accordance with EO 13514 and the Federal GHG Accounting and Reporting Guidance.

USDA developed its comprehensive inventory of Scope 1, 2, and 3 GHG emissions in January 2011

Leadership

The USDA SOC, which is chaired by the USDA SSO, is responsible for overseeing the overall objectives and goals of EO 13514. There are five workgroups under the direct leadership of the SOC: Environmental Management, Transportation, Facilities, Green Purchasing and Electronic Stewardship. The Facilities Workgroup serves as the key point of contact for day-to-day implementation of the USDA Scope 3 GHG reduction initiatives.

Implementation Methods

The development of USDA's comprehensive GHG inventory will inform the decision-making and implementation process under this goal. USDA will continue to develop and maintain its GHG inventory in accordance with the Federal Greenhouse Gas Accounting and Reporting Guidance and Technical Support Document (TSD). USDA will fully document its rationale, should it become necessary to deviate from calculation, data collection and management methodologies provided in the Guidance and TSD. Also, USDA will rely on updated guidance from CEQ and DOE as improvements in data collection and emission estimation becomes available and new Scope 3 categories are added to the Department's inventory.

In as much as GHG emissions touch on nearly every aspect of USDA's mission and operations, the Department will undertake an integrated, cross-competency approach for developing and managing its GHG inventory. Specifically, USDA will rely on the organizational structure and resources of its SOC to implement measures for reducing Scope 3 GHG emissions and managing the Department's comprehensive GHG inventory. Additionally, USDA will integrate Scope 3 GHG reduction strategies and GHG inventory management into its strategic plans, policies, and regulations, including: USDA Strategic Plan; USDA DR-5500-001; USDA's EMSs; and USDA Travel Policy and Regulations.

USDA will explore opportunities and develop strategies to reduce GHG emissions; specific initiatives and programs are described below:

1) Telework

Explore opportunities to increase utilization of telework, alternative work schedules, and regional telework centers, which will reduce GHG emissions from employee commuting and contracted wastewater treatment.

2) Use of Telecommunications

Explore opportunities to facilitate the increased utilization of conference calls, video-conferencing, webinars, and web-conferencing, which will reduce GHG emissions from business travel.

3) Reduction in Non-renewable Electricity Purchases

Rely on the implementation strategies and initiatives outlined on Goal 1 of the SSPP to reduce GHG emissions from T&D losses. GHG emissions from T&D losses track directly to the use of electricity generated “off-site” (a Scope 2 activity).

4) Tracking Solid Waste

Refine methods to gather baseline data and reduce current non-hazardous waste for USDA-owned facilities.

5) Communication and Networking

Facilitate communication and networking across agency boundaries to share successful implementation strategies to reduce Scope 3 GHG emissions.

6) Training, Awareness, and Recognition

Raise the level of participation and visibility of USDA in government-wide energy, travel, and waste management initiatives while increasing the awareness of these initiatives within the Department. Continue to promote awareness, education, and training of energy, travel, and waste management initiatives through the USDA Sustainable Operations Website

7) Monitoring and Accountability

Develop a scorecard to track how well agencies and staff offices are executing the Department’s initiatives relating to this goal.

Positions

USDA anticipates that it will utilize current staffing to implement Scope 3 GHG reduction measures and maintain the Department’s GHG inventory. Staffing for implementing these activities consists of full time employees for which Scope 3 GHG emissions reduction and GHG inventory management are collateral duties.

Planning Table

SCOPE 3 GHG TARGET	Units	FY 10	FY 11	FY 12	FY 13	FY 14	FY 15	...	FY 20
Total Scope 3 GHG Emissions (Comprehensive)	MTCO ₂ e	245,385	245,050	244,533	244,015	243,498	242,980		240,651
Total Scope 3 GHG Emissions (Subject to Agency Scope 3 GHG Reduction Target)	MTCO ₂ e	243,896	243,444	242,930	242,416	241,902	241,388		239,074
Overall Agency Scope 3 Reduction (reduced from FY08 base year)	%	5.1	5.3	5.5	5.7	5.9	6.1		7.0

Status

USDA's FY 2010 Scope 3 GHG emissions were calculated to be 243,896 MTCO₂e, which represents a 5.1 percent decrease, compared to FY 2008 Scope 3 GHG emissions. USDA anticipates a reduction in GHG emissions in future years primarily due to anticipated: (1) reductions in T&D losses from energy purchases; (2) reductions in employee travel; and (3) reductions in contracted waste treatment/disposal.

USDA employed the Quality Assurance Verification and Validation (QAV2) process in developing its GHG inventories for fiscal years 2008 and 2010. In conjunction with the QAV2 process, USDA developed a Greenhouse Gas Inventory Management Plan (IMP), which describes our process for verifying the reliability of our GHG Inventory as well as our plan for improving data quality over time.

There was a wide variation in the quality and accuracy of the data collected and used for calculating GHG emissions. Data related to energy use, buildings, and business travel was obtained from USDA corporate systems (e.g., NFC Energy Module, CPAIS, and Access Online) and government systems such as GSA's TravelTrax. These data sources were considered to be highly reliable. However, procurement-related data (e.g., refrigerants) were based on estimates and data from employee surveys and had to be extrapolated.

USDA will continue to promote telework programs to the maximum extent possible without diminished employee performance. USDA DR-4080-811-002 sets forth the authority, policy, and responsibilities for managing teleworking programs within the Department. USDA is currently utilizing telecommunications to reduce GHG emissions. This method is not currently being tracked on a national scale; however USDA hopes to do so within the next couple years.

USDA is improving its energy efficiency and renewable energy use performance; therefore, reducing associated transmission and distribution losses from electricity purchases. A summary of USDA's recent energy intensity reduction and renewable energy use performance is included under Goal 1 of the SSPP. USDA has made significant progress in reducing waste at our HQ facilities and at various other facilities through the use of EMSs and Green Teams. A summary of accomplishments related to waste reduction can be found under Goal 5 of the SSPP. The table below provides a summary of the methodologies and tools used to estimate Scope 3 GHG emissions.

Methodologies and Tools used to estimate Scope 3 GHG emissions		
Scope 3 GHG Emissions Category	Sources of Data	Tools
Employee Business Travel	USDA Travel Records	TravelTrax
Employee Commuting	Employee Surveys	FEMP GHG Tool
T&D Losses	NFC Utility Invoices	FEMP GHG Tool
Contracted Solid Waste	Waste Receipts and Weight Slips	FEMP GHG Tool
Contracted Wastewater Treatment	HR Records	FEMP GHG Tool

Goal 3 – High-Performance Sustainable Design/ Green Buildings & Regional and Local Planning

Description and Objectives

EO 13514 mandates that Federal agencies, as leaders in environmental stewardship, apply the Guiding Principles to all new building construction, and to major and minor renovations over 5,000 GSF. A total of 2,292 USDA buildings exceed 5,000 GSF accounting for 30.8 million GSF that fall under this requirement of the EO.

Objective 1 - Design for Net Zero Energy

Design all new Federal buildings to achieve zero-net energy by FY 2030.

Objective 2 – Follow the Guiding Principles for Federal Leadership in high Performance and sustainable Buildings

Comply with the Guiding Principles for Federal Leadership in High Performance and Sustainable Buildings (Guiding Principles) in all new construction, major renovation or repair and alteration of Federal buildings. Demonstrate that at least 15 percent of USDA's existing building inventory (above 5,000 gross square feet/building) meets the Guiding Principles by FY 2015. Demonstrate annual progress toward 100 percent conformance with Guiding Principles for entire building inventory by 2015 and thereafter.

Objective 3 – Incorporate Sustainable Practices into Leased Facilities

Ensure leases for new facilities and renewals of existing facilities incorporate sustainable practice provisions. Encourage landlords of existing facilities to adopt sustainable practices into existing leases.

Objective 4 – Build, Operate, and Maintain Facilities and Landscapes Sustainably

Demonstrate use of cost-effective, innovative building and sustainable landscaping strategies to minimize energy, water and materials consumption. Operate and maintain and conduct all minor repairs and alterations for existing building systems to reduce energy, water and materials consumption in a manner that achieves a net reduction in deferred maintenance costs.

Use site planning, design, construction, and maintenance strategies in USDA development or redevelopment projects with a property footprint exceeding 5,000 square feet to maintain or restore, to the maximum extent technically feasible, the predevelopment hydrology of the property with regard to the temperature, rate, volume, and duration of flow. Implement this policy in a manner consistent with Environmental Protection Agency stormwater management guidance issued under Section 438 of the EISA and Section 14 of EO 13514.

Objective 5 – Use Space Management Strategies to Promote Sustainable Building Policies

Optimize performance of USDA's real property portfolio – dispose and consolidate excess and underutilized property, collocate field offices, and consolidate across metropolitan and regional locations. Reduce the need for new building and field office space by utilizing technologies to increase telework opportunities and expand delivery of services (over the internet or electronically). Align space actions (new leases, new construction, and consolidation) with Scope 1, 2, and 3 greenhouse gas reduction targets.

Objective 6 – Use Domestic Wood as the Preferred Sustainable Building Construction Material

Use domestically harvested wood products, ideally locally sourced and from National Forest System lands wherever practicable and feasible, as the preferred green building material for all USDA facilities and buildings.

This recently adopted policy is consistent with EO 13514 due to the environmental benefits of wood, including reduced energy consumption and reduction of GHGs. Life-cycle research studies show that fossil fuel consumption, potential contributions to GHG emissions and quantities of solid waste tend to be less for manufacturing and use of wood products than for competing products. Moreover, wood products that are installed and used appropriately tend to have lower environmental emissions and burdens than functionally equivalent products of other materials. USDA will use its position on the White House Steering Committee on Federal Sustainability to promote this policy across the entire Federal government.

Objective 7 – Preserve our Nation’s Cultural Resources and Historic Properties

Conserve, rehabilitate, and reuse historic Federal properties, using current best practices and technology.

Objective 8 – Consultation and Cooperation with Regional and Local Planning Organizations

Incorporate consultation with local and metropolitan planning organizations regarding the impact, or potential impact, of Federal actions on local transportation infrastructure and local development plans into existing policy and guidance.

Objective 9 – Update Relevant Policies and Guidance

Align policies to increase effectiveness of local planning efforts regarding transportation, energy, resources and the environment. Update policies and guidance to ensure that all environmental impact statements and environmental assessments required under the National Environmental Policy Act for proposed new or expanded Federal facilities, as appropriate, identify and analyze impacts associated with energy (including alternative energy sources) and climate change. Update policies and guidance to ensure coordination and (where appropriate) consultation with Federal, State, Tribal and local management authorities regarding impacts to local ecosystems, watersheds and environmental management associated with proposed new or expanded Federal facilities.

Objective 10 – Implement Regional Measures

Increase the effectiveness of regional measures that enhance the integrity of local ecosystems and watersheds. Participate in critical local and regional efforts and initiatives (e.g., EO on Chesapeake Bay Protection and Restoration, EO on Stewardship of the Ocean, Our Coasts, and the Great Lakes, etc.).

Objective 11 – Integrate Methods/Practices into Planning Documents

Integrate methods and practices necessary to achieve the goals of this plan into master planning documents (i.e., high-performance, sustainable building goals, pollution prevention and waste reduction goals, water use reduction goals, sustainable acquisition goals, electronic stewardship and data center consolidation, etc.).

Leadership

The SOC, which is chaired by the USDA SSO, is responsible for overseeing the objectives and goals of EO 13514. There are five workgroups under the direct leadership of the SOC: Environmental Management, Transportation, Facilities, Green Purchasing and Electronic Stewardship. The Council works with respective USDA agencies to implement policy, guidance, and direction to implement Departmental sustainable practices.

USDA Office of Procurement and Property Management, Environmental Management Division (OPPM/EMD) provides sustainable building leadership and guidance to USDA agencies. This Division ensures that agency actions meet regulatory and OMB scorecard requirements.

Other key USDA offices and councils involved with leading sustainability include:

- **USDA Sustainable Development Office** - The Sustainable Development Office, operating within the Office of the Chief Economist (OCE), advances the principles and goals of sustainable development through partnerships, collaboration, and outreach. Their work focuses on sustainable agriculture, sustainable forests, and sustainable communities.
- **USDA Climate Change Program Office** - The Climate Change Program Office operates within OCE, functioning as the coordinator of agriculture, rural and forestry-related global change program and policy issues which face USDA. This Office also serves as USDA's focal point for climate change issues. This office is responsible for the climate change adaptation policy in conjunction with this plan.

High Performance/ Sustainable Buildings Implementation Methods

USDA has assessed a little less than half of its 2,292 buildings over 5,000 GSF and is using that information to develop a sustainability action plan for achieving the EO goal of 15 percent sustainable. In FY 2011 USDA is furthering sustainability assessments for existing buildings by identifying "targets of opportunity" (i.e., buildings closest to being considered sustainable). In FY 2011, as USDA assesses the inventory, we will also develop an initial baseline projection of the percentage of buildings sustainable by 2015. By FY 2012, USDA will be better able to forecast compliance with the 15 percent requirement.

Achieving the High-Performance Sustainable Design/Green Buildings goal will contribute to the success of other sustainable goals such as GHG reduction and water and energy conservation.

Critical implementation methods include:

- Integrate building concepts and high performance green building standards to plan and construct new facilities and to operate, maintain, and dispose of existing facilities.
- Weigh financial decisions that provide the greatest return on investment when enhancing existing building condition through sustainable design, construction, operations and maintenance practices.
- Implement sustainable building technical and assessment initiatives and provisions of various USDA policies and plans, including the annual USDA Sustainable Building Implementation Plan, DR 5500-001, the USDA Utilities Metering Guidance, and the USDA Renewable Energy Guidance.

- Measure sustainable building performance by way of a third-party certification system, such as the U.S. Green Building Council's (USGBC's) Leadership in Energy and Environmental Design (LEED) system, where practicable.
- Decrease environmental impacts and reach space consolidation goals, while expanding service delivery, promoting the use of telework and other alternative workplace, and reducing the need for new building and field office space.
- Right-sizing our real property inventory, by; (1) using existing assets prior to adding new assets, (2) consolidating and disposing of excess and underutilized real property across metropolitan and regional locations, (3) collocating field offices, (4) Increasing telework and use of electronic technologies.

As the USDA optimizes the size of its real property portfolio through consolidation and leasing actions and encourages telework, the department reaches its space consolidation goals and moves closer to achieving its GHG reduction targets.

Regional and Local Planning Implementation Methods

The USDA Annual Strategic Plan addresses initiatives to work with rural communities to create prosperity and ensure lands are conserved, restored, and made more resilient to climate change, while enhancing our water resources. This plan places emphasis on the use of partnerships with individuals, communities, and State, tribal and local governments in almost every aspect of USDA's operations. The 2010 Performance and Accountability Report illustrates USDA's wide range of programs that protect and conserve our natural resources, and provide a safe, sufficient and nutritious food supply. USDA continues to strengthen rural communities as we invest in strategic green-infrastructure, protect critical natural resources, promote rural leadership in sustainable renewable energy development, and ensure that markets for ecosystem services and mitigating climate change are available in rural communities, as well as jobs that conserve, restore, and manage natural resources. USDA also conducts environmental impact statements and environmental assessments as outlined in EO 13514 and required under NEPA.

Positions

USDA's Sustainable Practices Team has one dedicated sustainable buildings staff member. Several USDA agencies have energy and sustainable buildings leads; however their duties are mostly collateral to engineering or program management duties.

Planning Table

SUSTAINABLE HIGH PERFORMANCE BUILDINGS (Buildings Meeting Guiding Principles)	Units	FY 10	FY 11	FY 12	FY 13	FY 14	FY 15
Owned Facilities Targets	%	5.0	7.0	TBD	TBD	TBD	TBD
Leased Facilities Targets	%	5.0	7.0	TBD	TBD	TBD	TBD
Total Facility Targets	%	5.0	7.0	TBD	TBD	TBD	TBD

High Performance/ Sustainable Buildings Status

USDA applies sustainable construction policies and practices, consistently, across a wide variety of agencies and offices during new construction, major renovations or repairs and alterations of Federal buildings. USDA sustainable building strategies include both construction as well as building operations. The major limiting factor for achieving sustainability in our facilities is funding. We are committed to planning, designing, constructing and operating sustainable buildings to the extent our budget allows. In order to wisely use our limited resources, we will continue to evaluate our inventory and focus on those facilities that provide the greatest return on investment.

Although the Department will make every effort to meet the EO 13514 goal of having 15 percent of existing building inventory sustainable by 2015 as measured by building number it is unlikely that USDA will achieve this goal (USDA would achieve this requirement if measured by square footage). At this time, we do anticipate achieving an interim seven percent target in FY 2011. In FY 2011, as USDA assesses the inventory, we will also develop an initial baseline projection of the percentage of buildings sustainable by 2015. By FY 2012, USDA will be better able to forecast compliance with the 15 percent requirement.

Examples of recently completed sustainable building projects:

- USDA South Building Modernization in Washington DC, a multi-phased modernization built to the LEED Gold Standard by the Office of Operations
- FS Journal Service Center, built to meet specifications for the Gold level of LEED
- APHIS National Detector Dog Training Center, a build-to-suit LEED Gold USDA leased facility (see photo on the right)



USDA projects, recognized by the USGBC LEED system, at the certified, Gold and Silver level:

- ARS Combined Laboratory Facility in Ames, Iowa, completed to the LEED Certified level
- USDA South Building Modernization, a newly completed LEED Gold major renovation
- FS owned LEED Silver and Gold facilities:
 - Koen Federal Buildings Addition
 - Sandpoint Ranger District Office
 - Watersmeet Administrative Site
 - Bent Creek Forestry and Research Training Center
 - Cle Elum Ranger District Office Addition
 - McKenzie River Ranger District Renovation
 - Verde Administrative Site
 - Texas Supervisor's Office
- FS leased LEED registered facilities:
 - Tucson Dispatch Center
 - Santa Fe Supervisor's Office

- FSA LEED certified facilities, built to the Silver and certified levels:
 - Vineland Service Center
 - Randolph County Asheboro Service Center
 - PA USDA Service Center
 - Lincoln National Forest Supervisor's Office (see photo on the right)
 - Graves County - Knight Building
 - Hopkins County - Knight Building



USDA is currently responsible for 23 LEED-certified buildings, and has several LEED-registered buildings awaiting certification.



Examples include:
Southern Research Station, Savannah River Laboratory, Asheville, NC, LEED silver (left photo)

Chattahoochee-Oconee National Forest, Chattooga River Ranger Station, Gainesville, GA, LEED gold (right photo)



High Performance/ Sustainable Building accomplishments listed by initiative

1) Net-Zero Energy

- The FS San Dimas Technology and Development Center (SDTDC) in Southern California plans to become the FS's first net-zero facility. Using ARRA funds, the center recently completed the installation of 1,288 solar polysilicon panels for a projected annual energy output of 594,091 kWh/yr (see photo on the right). SDTDC also reduces total facility energy demand through numerous energy efficiency projects, including motor efficiency upgrades, HVAC system replacement, energy efficient lamps, lighting occupancy sensors, and desk plug-load sensors.
- The FS's Western Collective worked on a pilot study of Net Zero Energy on the Shoshone National Forest. A detailed audit of energy consumption was conducted for each facility on the forest. Working with DOE's National Renewable Energy Lab (NREL), a plan was developed to optimize renewable energy technologies at each location in order to reach net zero energy consumption.
- The FS's Western Collective and NREL developed a net-zero energy model for buildings and partnered with the Environmental Protection Agency (EPA) to define net-zero waste, as well as establish a ranger district implementation model.



2) Guiding Principles

USDA follows the Guiding Principles in construction policies and practices, across a wide variety of building types, throughout the life cycle. USDA policy requires agencies to plan, design, construct, operate, maintain, and dispose of facilities sustainably. Wherever a new facility, alteration or addition is built, the available funds are used to raise the level of sustainability as much as funding allows. USDA is in the process of assessing its existing buildings to establish a baseline and to measure progress towards full conformance with the Guiding Principles. USDA, in FY 2010, realizes 5.46 percent of its existing facilities as meeting the Guiding Principles.

3) Incorporate sustainable practices into Federal leases

USDA uses green leasing standards for all new leasing actions requiring that projects meet criteria for LEED Silver and the Guiding Principles. All new USDA leases incorporate the Energy Star Label criteria, and solicitations include green clauses. New leases require that lessors with buildings over 5,000 GSF follow the Guiding Principles to meet USDA existing building sustainability requirements. All APHIS build-to-suit leases are required to build toward LEED Silver. Furthermore, APHIS is notifying lessors, where leases may be renewed, of the requirement that USDA lease sustainable buildings, and of the sustainability criteria that they must meet.

4) Operating and Maintaining Facilities and Grounds Sustainably

- APHIS completed several energy alteration projects for energy conservation and green leasing activities, including the Butler Square Building. Butler Square is the first historical property in Minnesota with a LEED rating, holding an Energy Star Label since 2010, and a LEED Certified historic property. APHIS completed a Plant Inspection Station, an Energy Star Labeled building constructed towards LEED Silver, in Los Angeles, California.
- USDA conserves energy and other natural resources in managing existing building systems, and follows sustainable landscaping and green infrastructure principles in its site practices. Sustainable practices in operation, maintenance, repair and alterations continue to reduce energy, water and materials consumption and achieve reduced deferred maintenance costs.
- The USDA HQ Office of Operations implements renewable energy and low impact development projects wherever possible. Recent South Building modernization improvements include heat recovery systems and a chilled water plant using thermal ice storage. Recently installed green roofs on USDA HQ facilities (see photo on right) not only add aesthetic value, but also save energy and help address a serious environmental problem of combined sewer overflows in Washington D.C.



- USDA food service operations include “green” cafeterias that divert organic waste for composting. USDA utilizes “green” housekeeping (e.g. bio-based products and high efficiency particulate air vacuum cleaners) and “green” landscaping equipment (e.g. electric rider mowers and propane powered lawn equipment). Landscaping practices have evolved from traditional labor and water intensive programs to establishing native plants, rain gardens, and pollinator gardens.

5) Innovative and sustainable construction and landscaping technologies

- FS Rocky Mountain Research Station, in collaboration with the University of Idaho, developed the Western Biomass Tool to estimate the costs of harvesting, chipping, and transporting biomass. FS staffs utilize this tool to determine if the value of the biomass for power generation and ethanol production is high enough to cover the cost of removal.
- FS San Dimas Technology and Development Center renewable energy projects include, upgrades to a HVAC system using a lake source heat pump, solar energy installation, rainwater catchments and xeriscaping.
- APHIS and ARS are completing a sustainable courtyard project at their combined Laboratory in Ames, Iowa. This project includes rain recovery measures such as rain gardens to decrease stormwater run-off. Landscaping includes Iowa native plants, a pollinator garden, and trees planned to provide shade and air-conditioning load reduction.
- APHIS is improving their Newnan Training facility by incorporating an innovative and cost effective water recycling system that includes a 40,000 gallon underground cistern that collects rainwater from the roofs of the facility for re-use in flushing toilets and washing kennels. The system is expected to save 110,000 gallons of domestic water annually.
- APHIS is improving their San Juan plant inspection station by installing desuperheated chillers. Because air handling units must use high volumes of outside air, over-cooling the supply air removes the moisture. The supply air is reheated in order to make the space comfortable. The desuperheaters use the rejected heat from the chillers to reheat the supply air, making the chillers efficient and using very little energy. In standard practice, the chillers reject their heat to the outside and reheating is accomplished by a boiler or water heater.

6) Other High Performance/ Sustainable Building Initiatives

The ARS green cleaning initiative which was launched in FY 2010 requires the use of green cleaning products in custodial contracts and all Research, Education, and Economics mission area facilities. The objective is to provide effective and cost competitive cleaning solutions, and to use biologically compatible, biodegradable and safe products, while improving indoor air quality and working conditions. ARS is publishing “Biobased Success Stories” about green cleaning product use.

Regional and Local Planning Status

USDA participates in local, regional, and metropolitan planning efforts that promote and achieve sustainability. These efforts incorporate existing policy and guidance consultation on Federal actions with local, state and city planning organizations and governments.

USDA policies with respect to transportation, energy resources and the environment are aligned with effective local planning strategies. USDA incorporates sustainable building location into policy and planning for new Federal facilities and leases and provides incentives for sustainable locations in the building assessment process. USDA collaborates with the National Capital Planning Commission (NCPC) and other State and Federal agencies, to recognize, and give incentive for, sustainable building locations. The sustainable site objectives are specifically reflected in many USDA regional projects, including the Southwest Ecodistrict project and the NCPC Monumental Core Framework Plan.

Regional and Local Planning accomplishments listed by initiative:

1) Southwest Ecodistrict Project

USDA, NCPC, GSA, EPA, DOE, and District of Columbia Southwest Ecodistrict project incorporate planning on impact of Federal actions into existing policy and guidance. The collaboration is a specific planning effort which seeks to conserve energy, resources and the environment, create viable mass transportation nodes, and to implement the Guiding Principles. The project initiative includes showcasing sustainability 'Ecodistrict' in Southwest Washington, DC and revitalizing several urban corridors. It engages Federal agencies, the District of Columbia, and private land owners and residents.

2) USDA HQ Energy Conservation, Stormwater Management, and Waste Management

USDA HQ Complex in Washington DC, under the stewardship of its Office of Operations (OO) is enhancing energy conservation, stormwater management and waste management practices. The HQ Complex includes three buildings on the National Mall and the George Washington Carver Center at Beltsville MD. This complex participates in regional energy resources Demand Response Programs. The Demand Response Programs lower operating costs, reduce the need to expand the power grid transmission and generation assets, and improve grid reliability. Stormwater management projects which include green roofs and rain gardens serve as a showcase for low-impact development strategies. Several collaboration projects are currently underway which provide natural habitat for native species, a critical regional effort related to the Chesapeake Bay. Recent installations include a second green roof on the Court 5 roof of the USDA South Building on the National Mall and a rain garden built in the parking lot median at the George Washington Carver Center.

USDA is working with other government agencies, non-profits and companies to increase composting in the Washington Metropolitan Area, especially at the USDA HQ complex, to divert organic material from the waste stream. USDA HQ complex is an EPA WasteWiser partner, working with other Federal agencies to change behaviors and track internal waste reduction efforts.

3) Greenhouse Gas Inventory and Climate Change Planning

The FS is partnering with NREL in the Greater Yellowstone Area (GYA) Greenhouse Gas Inventory and Climate Action Planning process. Through a FEMP Technical Assistance grant, NREL engineers facilitate the creation of the GYA Climate Action Plan through education, technical assistance, and GYA-wide action planning workshops. Currently, NREL and the FS are forming a regional pilot project for bottom-up GHG inventorying and accounting, as well as meeting EO and statutory requirements on GHG accounting and inventories as stated in Goals 1 and 2. This Agreement also monitors progress and updates the Tongass National Forest and the GYA National Forests Climate Action Plans. The Beaverhead-Deerlodge, Bridger-Teton, Caribou-Targhee, Custer, Gallatin, and Shoshone National Forests collaborated on the plan along with Grand Teton National Park, Yellowstone National Park, the National Elk Refuge, and Red Rock Lakes National Wildlife Refuge. Coordinated implementation of the GYA Climate Action Plan has already begun.

4) West Coast Federal Green Challenge

FS Regions 5 and 6 are partnering with the West Coast Federal Green Challenge, an effort spearheaded by the EPA in support of EO 13423 and EO 13514 to reduce Agency carbon footprints and save money. Under this initiative, Regions 5 and 6 pledge to reduce carbon emissions by 5 percent annually in at least two of six areas: water, energy, transportation, electronics, and purchasing. Both Regions focus their efforts on energy and transportation. Region 6 plans to add water as a focus area in 2012.



5) Biofuels and other Renewable Systems

A January, 2010 Memorandum of Understanding between the USDA and the Department of the Navy, encourages the development of advanced biofuels and other renewable energy systems. The Departments work together to support President Obama's initiative to make the United States a global leader in developing a renewable energy economy, reducing energy consumption derived from fossil fuels, and increasing energy production from renewable energy sources.

6) Chesapeake Bay Conservation Partnership Projects

Since April 2010, USDA is accelerating voluntary efforts toward a healthy and restored Chesapeake Bay, through its Cooperative Conservation Partnership Initiative (CCPI), a NRCS initiative using existing conservation programs. CCPI projects improve water quality in six states by working with landowners and operators to reduce sediments and nutrients, increase carbon sequestration, and contribute to a healthy Chesapeake Bay.

USDA is making at least \$5 million in financial assistance available for single-state and multi-state partnership projects that address natural resource concerns within six Chesapeake Bay Watershed states: New York, Delaware, Maryland, Pennsylvania, Virginia, and West Virginia. Funding for the CCPI comes from two NRCS programs, the Environmental Quality Incentives Program and the Wildlife Habitat Incentive Program.

7) Mississippi River Basin Conservation Partnership Project

To improve the health of the Mississippi River Basin, including water quality and wildlife habitat, NRCS is developing the Mississippi River Basin Healthy Watersheds Initiative (MRBI). Through this new Initiative, NRCS and its partners help producers in selected watersheds in the Mississippi River Basin to voluntarily implement conservation practices that avoid, control, and trap nutrient runoff; improve wildlife habitat; and maintain agricultural productivity. MRBI conserves the resources of 41 watersheds in 12 states through existing NRCS programs and initiatives. The USDA cooperates with agricultural producers, partner organizations, and Federal, State, and local agencies to improve the watersheds and quality of life for those millions living in the Mississippi River Basin.

GOAL 4 - Water Use Efficiency and Management

Description and Objectives

USDA will promote water conservation through identification of water inefficiencies and implementation of water conservation projects.

Note - The goals described below exclude water that the FS uses to fight forest fires. Fire fighting is considered an emergency response and may be exempted from EO 13514 water conservation requirements. Section 18 (c) (i) states: The head of an agency may exempt law enforcement, protective, emergency response, or military tactical vehicle fleets of that agency from the provisions of this order, other than this subsection and section 20.

Objective 1 – Reduce Potable Water Use

Institute practices to reduce potable water use intensity by at least 26 percent by FY 2020, relative to USDA's FY 2007 baseline, as required by EO 13514.

In FY 2007, USDA's potable water use intensity was 18.7 gallons per gross square foot. Our target potable water use intensity for FY 2020 is 13.8 gallons per gross square foot. The FY 2020 reduction target assumes that USDA will meet EO 13423 16 percent water use intensity reduction requirement by the end of FY 2015; while achieving an additional 2 percent reduction in water use intensity per year from FY2016 to FY2020.

Objective 2 – Reduce Industrial, Landscaping, and Agricultural Water Use

Seek opportunities to reduce industrial, landscaping, and agricultural water use by 20 percent by FY 2020, relative to USDA's FY 2010 baseline, as required by EO 13514.

Objective 3 – Stormwater design

Use technically feasible stormwater control practices in development or redevelopment projects that use or mimic natural hydrologic processes to manage the temperature, rate, volume, and duration of flow of stormwater discharge to achieve the specific performance objectives of EISA Section 438, EPA's Stormwater Guidance for Federal Facilities, and Section 14 of EO 13514.

Leadership

The USDA SOC, which is chaired by the USDA SOC, is responsible for overseeing the overall objectives and goals of EO 13514. There are five workgroups under the direct leadership of the SOC: Environmental Management, Transportation, Facilities, Green purchasing and Electronic Stewardship workgroup. The Facilities Workgroup serves as the key point of contact for this goal.

Implementation methods

USDA will rely on the organizational structure and resources of its SOC to implement measures to facilitate compliance with EO 13514. The efforts of the SOC are supported at the national level by groups such as the USDA's Asset Management Council and Procurement Council as well as various workgroups and employee Green Teams at the regional and field levels. USDA will continue to integrate its strategic plans and policies with the services provided by FEMP to create effective management tools and initiatives to achieve its Water Use Efficiency and Management Targets by FY 2020. The Department's planned implementation initiatives will incorporate provisions from various USDA policies and plans including: DR-5500-001; the USDA Utilities Metering Guidance; and USDA's EMSs.

Examples of management tools/strategies that USDA uses to achieve this goal include DOE sponsored ESPC and UESC; awards programs, employee performance evaluations and training, metering, and Life Cycle Cost Analysis. Other tools/strategies include utilizing internal USDA Agency scorecards and corporate data management systems.

Specific initiatives USDA will employ entail increasing the use of water efficient products, implementing water best management practices (BMPs), performing facility water audits, designing facilities to protect and preserve water resources, as well as, maintaining or restoring pre-development hydrology.

Achieving this goal should help USDA comply with the High Performance and Sustainable Buildings Guiding Principles in Goal 3. Also, synergies should be achieved between this goal and Goal 1, due to the similar implementation strategies that USDA plans to employ in attaining these respective goals.

Initiatives and programs

1) Life-Cycle Cost Analysis

Use life-cycle cost methodologies and value engineering to identify/implement life-cycle cost-effective opportunities to improve water efficiency

2) Facility Water Audits and Efficiency Improvements

- Conduct water audits of EISA Section 432 covered facilities to the greatest extent possible, subject to available funding. As evaluations are completed, USDA will continue to identify and implement projects that improve water use efficiency.
- Renovation projects will include a water use analysis during the conceptual phase to identify potential opportunities. New water conservation technologies will be considered in appropriate repair and construction projects.

3) Metering

Install advanced meters, whenever life-cycle cost effective. By utilizing advanced metering technologies, USDA will obtain the information needed to meet water conservation goals, save money, and improve the Department's building operations

4) Alternative Financing Mechanisms

Promote ESPCs and UESCs, when life-cycle cost effective, to help finance water efficiency projects. USDA agencies will review completed audit reports and identify sites with potential for

ESPC and/or UESC projects. USDA anticipates that it will continue to receive annual benefits in reduced water use from ESPCs and UESCs awarded in previous fiscal years

5) Green Infrastructure/Low Impact Design

Use Green Infrastructure/Low Impact Design (GI/LID) management practices to maintain or restore the on-site pre-development hydrology. These practices mimic the natural hydrologic cycle processes of infiltration, evapotranspiration, and re-use, and enable local re-use of precipitation. The Department uses these practices at the site, neighborhood, or regional scale to allow precipitation to infiltrate, recharge groundwater, and release into the atmosphere

6) Stormwater Management

Follow design, construction, and maintenance stormwater management practices that either: 1) manage rainfall onsite, and prevent the off-site discharge of the precipitation from all rainfall events less than or equal to the 95th percentile rainfall event, or; 2) preserve the pre-development runoff conditions following construction, determined by a site-specific hydrologic analysis

7) Training, Awareness, and Recognition

- Raise the level of participation and visibility of USDA in government-wide water management initiatives while increasing the awareness of these initiatives within the Department. Promote awareness, education, and training of water use requirements through the USDA Sustainable Operations Website.
- Provide timely and topical water management training and materials to its employees to keep up awareness.
- Encourage attendance in training programs and workshops provided by the FEMP, private and public institutions, and other Federal agencies.
- Sponsor GovEnergy 2011, and encourage employee participation in this annual conference
- Promote employee commitment to improving water efficiency through awards and recognition programs.
- Participate in the Annual Federal Energy and Water Management Awards program and the “You Have the Power” recognition program; submit FY 2011 nominations for these award programs to recognize outstanding water use efficiency and management
- Encourage and support USDA agency-specific employee award and recognition programs that cover a broad range of categories, including water use efficiency and conservation.

8) Monitoring and Accountability

- Continue to incorporate water management responsibilities as an element in position descriptions and performance evaluation standards of its personnel (e.g., facility managers, area and location engineers, building engineers, maintenance mechanics, energy managers, engineering project managers, and procurement personnel) considered critical to the implementation of this goal.
- Develop a scorecard to track how well its agencies and staff offices are executing the Department’s initiatives relating to this goal.

Positions

USDA anticipates that it will utilize current staffing to support the development and implementation of the Department’s Water Use Efficiency and Management initiatives. A significant amount of this work will continue to be provided by employees as a collateral duty.

Planning table

WATER USE EFFICIENCY & MGMT	Units	FY 10	FY 11	FY 12	FY 13	FY 14	FY 15	...	FY 20
Potable Water Reduction Targets (gal/SF reduced from FY07 base year)	%	6%	8%	10%	12%	14%	16%	...	26%
Planned Potable Water Reduction (gal/SF reduced from FY07 base year)	%	14.1	15	16	17	18	19	...	26
Industrial, Landscaping, and Agricultural Water Reduction Targets (gal reduced from FY10 base year)	%	-	2%	4%	6%	8%	10%	...	20%
Planned Industrial, Landscaping, and Agricultural Water Reduction (gal reduced from FY10 base year)	%	-	2%	4%	6%	8%	10%	...	20%

Status

USDA has made significant progress in recent years in improving its water use efficiency and management performance. In FY 2010, USDA achieved statutory goals and policy requirements relating to water use intensity reduction.

FY 2010 performance and initiatives

- Used an estimated 880 million gallons of water in its buildings during FY 2010 at a cost of \$3.4 million. FY 2010 consumption level translates to 16.1 gallons per GSF, which represents a 14.1 percent reduction compared to the FY 2007 baseline amount of 18.7 gallons per GSF. USDA exceeded the EO 13423 reduction goal for FY 2010 of 6 percent.
- Executed a wide variety of new and ongoing water conserving practices during FY 2010, including installing water meters as part of new construction projects; installing low-flow water devices; and utilizing rain sensors and native plant species for landscaping. USDA also employed techniques such as leak detection and historical data analysis throughout the Department.
- Continued to operate its Sustainable Landscape Partnership to address sustainable landscaping at facilities within the National Capital Region.
- Conducted energy and water evaluations for at least 50 percent of its covered facilities in accordance with EISA Section 432.
- Achieved a Green rating for status and progress on the OMB Sustainability/Energy Management Scorecard
- Established a FY 2010 baseline for industrial, landscaping, and agricultural water use (2,532 million gallons).
- Updated the USDA Water Conservation Guidance to incorporate provisions contained in EO 13514
- Updated the USDA Metering Plan and Guidance to include water consumption

Planned initiatives for FY 2011 and beyond:

- Perform energy and water evaluations for at least 75 percent of USDA covered facilities in accordance with EISA Section 432 requirements
- USDA agencies will continue to pursue ESPC opportunities. Specifically, agencies will review data from EISA Section 432 water evaluations to determine if it is cost effective to employ the use of ESPCs or UESCs as a follow-up to the site evaluations

- Continue installations of advanced metering at priority facilities
- Develop USDA Agency Scorecards for Water Use Management and track agencies' progress
- Develop better collection methodologies for capturing water consumption and costs data. USDA lacks a Department-wide system for tracking water use, and has to rely on cost-based estimates (from water, trash, and other utilities object class accounting codes) for reporting
- Participate in FEMP First Thursday Seminars.

GOAL 5 - Pollution Prevention and Waste Reduction

Description and Objectives

USDA's target date for diverting 50 percent of non-hazardous solid waste is FY 2013, using FY 2008 as a baseline. By FY 2014, USDA plans to divert 55 percent of solid waste. USDA's target date for diverting 50 percent of C&D waste is FY 2015.

USDA commits to continually reduce waste by reducing the use of printed paper, collecting more office recyclables per capita, increasing organics composting, and diverting more Construction and Demolition (C&D) waste from landfills. Since USDA is already using 30 percent postconsumer recycled content printing and writing paper in all offices, USDA will promote the use of uncoated 30 percent recycled paper in the same offices.

USDA commits to reducing the acquisition, use, and disposal of toxic and hazardous chemicals and materials, while increasing the use of acceptable alternative chemicals and processes. USDA will continue to practice integrated pest management in its landscaping, garden, farm, and livestock operations. USDA also commits to report in accordance with Sections (301-313) of the Emergency Planning and Community Right-to-Know Act (EPCRA) of 1986.

Leadership

The USDA SOC, which is chaired by the USDA SSO, is responsible for overseeing the overall objectives and goals of EO 13514. There are five workgroups under the direct leadership of the SOC: Environmental Management, Transportation, Facilities, Green Purchasing and Electronic Stewardship Workgroups. Several workgroups contribute to this goal including Green Purchasing, Facilities, and Environmental Management. The Facilities Workgroup is the key point of contact for the solid waste diversion goals.

Implementation Methods

USDA will rely on the organizational structure and resources of its SOC to implement measures to facilitate compliance with EO 13514. The efforts of the SOC are supported at the national level by the workgroups described above; as well as various employee-driven Green Teams and Agency-related Environmental Management teams at the national, regional and field levels which are instrumental in pollution prevention and waste reduction. Since waste generation cuts across multiple sustainability goals, the Department's planned implementation initiatives incorporate provisions from various USDA policies and plans including: DM-5600; the Sustainable Procurement Plan, the Sustainable Buildings Implementation Plan; Electronics Stewardship Plan; and Agency-specific EMSs. USDA shares these documents, as well as waste management best practices, through inter- and intra-net websites, SharePoint sites, and USDA Connect (USDA's social network website.)

USDA conducts waste management surveys for about 33 percent of Government-owned, USDA-occupied buildings to establish metrics, such as recycling rate, diversion rate, waste per capita, and recyclables per capita. USDA then extrapolates the data to the rest of the Department in Government-owned buildings to quantify Department-wide waste stream generation. (See "Status", below, for extrapolated figures.) Each quarter USDA is adding buildings to the survey so that more of the Department is represented. Through USDA agency surveys, USDA has determined that about 30

percent of USDA sites have recycling programs, though this figure is probably low due to lack of a Department-wide survey.

USDA tracks construction and demolition (C&D) waste diversion in new building construction, major renovations, and building modernizations utilizing data tracking methods under the Leadership in Energy and Environmental Design (LEED) certification. Those projects that seek LEED certification automatically pursue at least 50 percent C&D waste diversion; those projects that are not LEED-registered will seek 40 percent diversion in FY 2011 and 50 percent by FY 2012, following the best practices of LEED-registered.

USDA continues to emphasize waste reduction as its main waste management strategy, in keeping with the U.S. EPA's hierarchy of waste management. USDA's priorities are, in order: zero generation, reuse, recycling, waste-to-energy, and landfilling. USDA differentiates between the "recycling rate" and "diversion rate" by including waste reduction in the second. USDA measures waste reduction in the same way it measures energy usage reduction: by comparing a baseline year to subsequent years. The waste diversion that USDA has accomplished, and plans to accomplish up until FY2020, is a component of USDA's planned reduction of Scope 3 GHG emissions. Though waste and wastewater comprise only 2 percent of Scope 3 GHG emissions, USDA's planned waste diversion of 32 percent from the FY2008 baseline helped USDA project a Scope 3 GHG reduction of 7 percent by FY2020. (Employee travel makes up 89 percent of USDA's Scope 3 GHG emissions.)

USDA continues to reduce toxic and hazardous chemicals and materials through strategies such as acquisition of non-toxic alternatives as outlined in the USDA Sustainable Procurement Plan.

Positions

USDA anticipates that it will utilize current staffing to expand baseline and out-year data, and implement waste reduction and recycling measures. Staffing for all phases of recycling and waste reduction consists of full time employees for which waste management is a collateral duty.

Planning Table

POLLUTION PREVENTION & WASTE REDUCTION	Units	FY 10	FY 11	FY 12	FY 13	FY 14	FY 15	...	FY 20
Non-Hazardous Solid Waste Diversion Targets (Non-C&D)	%	45	50	53	55	55	55	...	55
C&D Material & Debris Diversion Targets	%	40	45	50	50	50	50	...	50
If agency uses on-site or off-site waste-to-energy, estimated total weight of materials managed through waste-to-energy (Gov't-owned)	Tons	660	600	540	500	500	500	...	500
Number of sites or facilities with on-site composting programs	#	NT	NT	NT	NT	NT	NT	...	NT
Number of sites or facilities recycling through off-site composting programs	#	5	5	7	9	10	11	...	11
If agency has on-site or off-site composting programs, estimated total weight of materials diverted to composting	Tons	26	55	65	70	80	85	...	85
% of agency-operated offices/sites with a recycling program	%	30	35	40	50	60	75	...	75
If agency offices located in multi-tenant buildings, % of those buildings with a recycling program	%	35	40	45	50	55	60	...	60
% of agency-operated residential housing with recycling programs	%	50	60	75	75	75	75	...	75

*Diversion refers to source reduction and recycling and does not include waste-to-energy.

NT = Not Tracked

Status

USDA has achieved significant waste management successes, at both our HQ facilities and throughout USDA. In FY 2010, USDA established a nationwide network of buildings that not only provide waste and recycling data, but also implement waste management best practices, some of which were first employed at USDA HQ in Washington, DC. These recycling practices include placing additional recycling containers inside and outside the buildings, disseminating recycling information to building tenants, and increasing the collection of electronic components. Waste reduction practices include removing subscribers from mailing lists, conducting business electronically, and reusing personal property. In FY 2010, USDA-occupied, Government-owned buildings generated 5090 tons of waste and 2900 tons of recyclables, for a recycling rate of about 35 percent. In these same buildings, USDA achieved a 45 percent waste diversion rate in FY 2010 by reducing the total waste stream by 10 percent compared to FY2008. USDA obtained these figures by extrapolating the data obtained from the surveyed buildings to encompass all estimated 36,000 USDA employees in Government-owned space.

Return on Investment

USDA agencies rely heavily on voluntary efforts of employees to achieve waste diversion successes, whether or not the diversion efforts occur in places that have good markets for recyclables. In any facility, the widespread participation of individuals is the key to a higher recycling rate. But to illustrate the difference between good and poor markets, in the second, Federal employees themselves must

sometimes haul the recyclables from work to a drop-off center. In places with good markets, contractors haul away the recyclables for nothing or pay the government for them.

Some areas of the country continue to have robust markets for recyclables. For instance, USDA HQ in Washington, DC earned over \$30,000 from the sale of recyclables through a GSA recycling contract in FY 2010. USDA HQ has helped its recycling program prosper by investing money earned from previous years in new containers, processing equipment, and signage. Because of the waste reduction and recycling achievements, USDA HQ was able to eliminate one trash compactor pickup a week in FY 2010, for an annual savings of over \$20,000. Moreover, by disposing of 120 less tons of trash in FY 2010 compared with FY 2009, USDA avoided about \$7000 in tipping fees. But markets change over time. The rest of the USDA buildings from across the country participating in GSA recycling programs earned only \$1600 in FY 2010. By contrast, in FY 1998, non-HQ USDA buildings nationwide earned \$12,600 from GSA sales contracts (HQ earned \$19,000).

Recycling of some commodities does not always pay, especially in areas that are located far from markets for recyclables. An example of this dynamic is the National Centers for Animal Health (NCAH) in Ames, Iowa. NCAH decided in FY 2011 to discontinue can and bottle recycling because of the fact that the local waste-to-energy (WTE) plant had recently installed equipment that separates these materials prior to incineration. NCAH also is questioning the environmental and economic viability of its paper recycling program, since the paper must undergo a 1,000-mile journey to the nearest pulp mill, which is in Alabama. Would fewer GHG emissions occur if the paper were used to generate electricity in the local WTE plant compared to the long haul to Alabama? The paper recycling program will continue unless NCAH ends up paying more to recycle the paper than to send it to the WTE plant. (USDA statistics show that in office buildings only 3 percent of recyclables are cans and bottles; 2 percent are small electronics and batteries; and 95 percent are paper products.)

Additional Highlights

- In FY 2010, USDA HQ installed a Somat[®] machine to grind and de-water food residuals from the cafeteria. The result of this acquisition is that the cafeteria is now sending 200 percent more residuals to a composting facility, from half a ton to a ton a week.
- USDA HQ initiated a “techno-scrap” program in which CD’s, VHS tapes, computer cables, and thumb drives are collected for reuse or recycling. HQ was already collecting batteries and small electronics.
- In FY 2011, the FS published a waste management manual entitled “Net Zero Waste” that emphasizes waste minimization but also gives practical advice on setting up a recycling program.

GOAL 6 - Sustainable Acquisition

Description and Objectives

EO 13514 calls for 95 percent of new contract actions to include sustainable products and services. The EO posts no date for accomplishing this goal, though subsequent CEQ/OMB Sustainability Plan templates have indicated that agencies must meet the 95 percent target by FY2010. USDA has determined, through various surveys and data calls, that it can accomplish the 95 percent goal by FY2014. The table below provides a breakdown of each sub-goal.

Sustainable Acquisition Subgoals & Targets	
Sub-Goal Description	Target
New Contract Actions using Sustainable Language	95 percent of new contracts will have sustainable acquisition language by FY2014
Energy Efficient Products	95 percent of applicable contracts will require energy efficient products by FY2012
Water Efficient Products	95 percent of applicable contracts will require water efficient products by FY2014
Biobased Products	95 percent of applicable contracts will require biobased products by FY2012
Recycled Content Products	95 percent of applicable contracts will require recycled content products by FY2012
Environmentally Preferable Products	95 percent of applicable contracts will require environmentally preferable products or services products by FY2014
Non Ozone-Depleting Products	95 percent of applicable contracts will require non ozone-depleting products by FY2012

USDA updated its Sustainable Procurement Plan (SPP; formerly, Green Purchasing Affirmative Procurement Plan) in FY 2011 to include all sustainable products and services mandated by EO 13514 and Federal statutes. The SPP also aligns with the SSPP so that the SPP reinforces the goals of the SSPP (see <http://greening.usda.gov/SPPUSDAfinalJan2011.pdf> .)

Leadership

The USDA SOC, which is chaired by the USDA SSO, is responsible for overseeing the overall objectives and goals of EO 13514. There are five workgroups under the direct leadership of the SOC: Environmental Management, Transportation, Facilities, Green Purchasing, and Electronic Stewardship. Several workgroups contribute to this goal including Green Purchasing, Facilities, and Environmental Management. The Green Purchasing Workgroup is the key point of contact for the sustainable acquisition goals.

Implementation Methods

Starting in FY 2010, USDA is reviewing about 40 percent of applicable contracts every quarter to determine the degree to which USDA agencies are placing therein appropriate sustainable product language. (See "Planning Table", below, for the methodology USDA uses to select and review applicable contracts.) This percentage is substantially more than the minimum 5 percent review rate that the OMB Sustainability/Energy Scorecard of January 2011 requires.

USDA then rates the contracts on a scale of 0 to 5 for compliance with sustainability where:

- “0” is no sustainable language at all.
- “1” is the presence of one sustainable product in either the clauses (Section I) or specification (Section C) sections of the contract. Multiple products that should be in the solicitation are lacking.
- “2” is the use of a single sustainable product in both the specifications and clauses sections. Some products that should be in the solicitation are lacking.
- “3” is the use of multiple sustainable products in either clauses or specifications with at least one product in both. Some products that should be in the solicitation are lacking.
- “4” is the use of multiple sustainable product language in both the specifications and clauses sections. All products that should be in the solicitation are included.
- “5” is the use of all applicable sustainable products in both the specifications and clauses sections with a statement of requirement to use sustainable products in the specifications section. If appropriate, sustainable language is included in Section M, Evaluation Factors.

USDA developed a spreadsheet that categorizes contracts by service or product type and documents level of compliance (or non-compliance) and corrective actions needed, if applicable. The Sustainable Acquisition Program Manager communicates the review findings to the rest of USDA through the Green Purchasing Workgroup, whose members disseminate the information to USDA agency requirements and contract officials.

Positions

USDA anticipates that it will utilize current staffing to continue to monitor contracts and implement sustainable acquisition measures. Staffing for all phases of contracted sustainable products and services purchasing consists of full time employees for which sustainable acquisition is a collateral duty.

Planning Table

SUSTAINABLE ACQUISITION	Units	FY 10	FY 11	FY 12	FY 13	FY 14	FY 15	..	FY 20
New Contract Actions Meeting Sustainable Acquisition Requirements	%	75	80	85	90	95	95	..	95
Energy Efficient Products (Energy Star, FEMP-designated, and low standby power devices)	%	85	90	95	95	95	95		95
Water Efficient Products	%	75	80	85	90	95	95	..	95
Biobased Products	%	88	91	95	95	95	95	..	95
Recycled Content Products	%	80	85	90	95	95	95	..	95
Environmentally Preferable Products/Services (excluding EPEAT – EPEAT is included in Goal 7)	%	75	80	85	90	95	95	..	95
SNAP/non-ozone depleting substances	%	85	90	95	95	95	95	..	95

SUSTAINABLE ACQUISITION CONTRACT REVIEW				
Contracts	1 st QTR FY 11	2 nd QTR FY 11	3 rd QTR FY 11 (Planned)	4 th QTR FY 11 (Planned)
Total # Agency Contracts	856	905	910	925
Total # Contracts Eligible for Review	87	92	95	100
Total Contracts Eligible Contract Reviewed (i.e., 5% or more eligible based on previous OMB guidance)*	34	42	40	43
# of Compliant Contracts	26	32	31	34
Total % of Compliant Contracts	75%	75%	77%	79%

Methodology behind Contract Review

USDA uses FedBizOpps (fbo.gov) to obtain most of the contracts for review, filtering out the type of contracts desired by Product Service Code (PSC). The result of the filter is an average of 300 to 350 contracts per quarter, from a grand total of about 900. Of this number, USDA obtains about 80 to 90 eligible contracts, and reviews about 35 of them. Ineligible contract actions include cancellations, modifications, sources sought, and services or products that are not applicable to sustainable products, such as software, labor only, and most trail and wetland restoration projects. The types of service contracts USDA selects for review, using the PSC filter, are new construction, facilities renovations, janitorial, landscaping, food service, and architectural-engineering. The types of product contracts USDA selects for review, using the PSC filter, are office products, furniture, electronics (including computers,) and building materials. USDA also ensures that contracts under review represent all major procuring USDA agencies, such as the FS, NRCS, ARS, APHIS, OCIO, and OO.

The advantage of using FedBizOpps is that USDA agencies post complete solicitation packets electronically. Some of these packets may contain hundreds of pages and take up large amount of data bytes. E-mailing such packets would be impossible, given the e-mail application limits on attachment size. And given the short timeframe for review and the dearth of qualified staff available to perform the review, USDA finds that having this data available online greatly streamlines what would otherwise be an unmanageable and cumbersome process. The reviewers are able to scan for keywords in the case of major construction projects, which may comprise hundreds of pages of architectural specifications.

USDA also obtains some contracts from the Federal Procurement Data System (FPDS) and works with Green Purchasing Workgroup staff to obtain and review contract specifications and solicitations. FPDS posts online only two pages of information per contract action; FPDS posts neither specifications nor other contractual documents. Another source for contract information is the USDA Integrated Acquisition System (IAS) but in this case the information is mainly for statistical purposes. The "Procurement Forecast" portion of IAS estimates how many contracts USDA will solicit in a fiscal year. The average number of contracts IAS forecasts is about 2400 per fiscal year. The average number of USDA contract actions posted to FedBizOpps per year is about 3500, but about half of these are modifications to existing contracts, cancellations of solicitations, and sources sought. USDA agencies procure most of the remaining 600 to 800 contracts that IAS forecasts through GSA's multiple award schedule (MAS) contracts, especially on "E-Buy", where MAS contracts compete with one another for bids. USDA did not access "E-Buy" for the current review but plans to do so in the future.

NOTE: USDA spends half of its acquisition funds on commodities (beans, grains, dairy products, meat, and other food items) these contracts are not applicable for sustainable acquisition language.

Status

USDA is on track to meet and in many cases exceed the sustainable acquisition goals of EO 13514.

Return on Investment

Though USDA is unable to quantify actual dollar savings from the procurement of sustainable products, we can cite various examples of cost benefits to the Federal Government. The Government obtains lifecycle cost savings by procuring energy-efficient equipment, which uses less power than the non-energy-efficient equipment. In many applications concrete with coal fly ash, an EPA-designated recycled product, withstands wear better than concrete without fly ash. A/E solicitations that require bidders to have experience with and expertise in energy conservation, use of recovered materials, and pollution prevention will preclude the Government from having to modify construction specifications, savings Federal labor dollars.

Status by initiative:

1) Compliance Monitoring

USDA is currently compliant with sustainable language in about 75 percent of the contracts. For those contracts that are either partially compliant or not compliant, USDA lists corrective action on the spreadsheet of reviewed contracts. For major renovation projects, a common USDA agency practice is to use the specifications that a contracted A/E firm has devised. These specifications are industry-based and thus rarely include designated products that the Government is obligated to use. The corrective action needed is that USDA staffs insert sustainable language into the A/E-generated specification prior to solicitation. Many solicitations have sustainable products Federal Acquisition Regulation (FAR) clauses in Section I, but make no mention of sustainable requirements in Section C, the specifications. The corrective action needed is that clear direction be given to potential bidders in Section C; otherwise bidders may not know the relationship of the FAR clause to the project.

2) Assessments

To complete the assessment of sustainable product acquisition, USDA needs to go beyond reviewing the solicitation language and find out if USDA agencies actually procured the designated products. Except for EPEAT-registered products, which USDA quantifies from the BPA, USDA has not performed this follow-up assessment for sustainable products to date. A starting point for such an assessment would be for FPDS and IAS to have fields for the six sustainable products categories. In order to obligate or spend appropriations, procurement officials would have to first check off the applicable fields. FPDS currently has "recovered materials" and IAS has "biobased" as the sole required fields. USDA proposes to insert the other five sustainable products fields in IAS in FY 2011 and make them mandatory in FY 2012. Before being able to obligate funds, officials would have to check off the appropriate fields in IAS.

3) Awareness

A key component of a sustainable acquisition program is awareness training. In this regard, USDA developed an online training course that covers the six required product categories, and posted the training in FY 2010 to AgLearn, USDA's official online training program. Currently, the training is voluntary, but USDA plans to make the training mandatory for contracting staff in FY 2012. USDA has obtained training development software licenses so that USDA employees themselves may

revise the course as Federal requirements change, a more streamlined approach than relying on contractual support.

4) BioPreferred Program

USDA expanded to 50 the number of product categories designated for Federal preferred procurement, with another 16 proposed. BioPreferred also successfully launched the “USDA Certified Biobased Product” label in January 2011, making biobased products available to the general public.

Additional Highlights

- In January 2011 BioPreferred Program launched a product labeling program, in which companies and vendors may obtain a certified biobased label for qualified products and packaging. Several products were already available to consumers by April 2011.
- Some of the A/E solicitations are now requiring that potential bidders have staff knowledgeable of Federal environmental requirements for products and design. For instance, an indefinite delivery/indefinite quantity (IDIQ) contract for architectural services that the OO solicited asks that the firm have a LEED-certified architect or engineer on staff.
- All new FS construction projects are required to be LEED-certified, Silver level.

GOAL 7 - Electronic Stewardship and Data Center

Description

The four goals of Electronics Stewardship mandated by EO 13423 and reinforced by EO 13514 that USDA has pursued are: purchasing of 95 percent EPEAT products, enabling power management on all applicable computers and monitors, extending computers' lifespan to four years, and using environmentally sound disposition practices for all excess and surplus electronics. The USDA Data Center Consolidation Plan, which OMB approved in August 2010, addresses how USDA will both reduce the number of data centers it operates and improve the efficiency of its data centers.

Below are specific USDA target dates for sub-goals that OMB has enumerated:

Electronic Stewardship Sub-goals and Targets	
Sub-goal Description	Target
% of applicable products that are Energy Star-qualified	95% of applicable products will be Energy Star-qualified by FY2012
% of applicable products that are EPEAT-registered	96% of applicable products are currently EPEAT-registered
% of applicable products that are FEMP-designated	95% of applicable products will be FEMP-designated by FY2012
% of agency, eligible PC, Laptops, and Monitors with power management actively implemented and in use	100% of eligible desktops, laptops, and displays will have power management implemented by FY2013
% of eligible electronic printing products with duplexing features in use	100% of eligible electronic printing products will have default duplexing implemented by FY2015
% of electronic assets covered by sound disposition practices	100% of electronic assets will be covered by sound disposition practices by FY2011
% of agency data centers independently metered, advanced metered, or sub-metered to determine monthly (or more frequently) Power Utilization Effectiveness (PUE).	100% of data centers will be metered to determine monthly (or more frequently) PUE by FY2013-
Reduction in the number of agency data centers	USDA will reduce the number of data centers from 46 to 5 by FY2015
% of agency data centers operating with an average CPU utilization greater than 65%	75% of data centers will have a CPU utilization rate of greater than 65% by FY2012
Maximum annual weighted average Power Utilization Effectiveness (PUE) for agency	USDA will have an average PUE of 1.4 by FY2015

Leadership

The USDA SOC, which is chaired by the USDA SSO, is responsible for overseeing the overall objectives and goals of EO 13514. There are five workgroups under the direct leadership of the SOC: Environmental Management, Transportation, Facilities, Green Purchasing, and Electronic Stewardship. Several workgroups contribute to this goal including Green Purchasing, Facilities, and Environmental Management. The Electronics Stewardship Workgroup is the key point of contact for the electronics stewardship and data center goals.

Implementation Methods

USDA follows the Electronics Stewardship Plan, January 2011 revision, to implement the EO 13514-mandated goals: procuring EPEAT products, extending the life of computers to four years, enabling power management on all applicable electronics, and using environmentally sound practices for excess and surplus electronics. In 2008 USDA issued Departmental Regulation 3170, End User Workstation Standards, to codify the four goals as well as that of duplex printing. USDA uses the Agency Asset Management System on the GSAXcess website to handle all excess and surplus electronics, and has memoranda of agreement with UNICOR for electronics refurbishing and recycling services. USDA procures Energy Star-qualified, FEMP-designated, and EPEAT-registered electronics using Department-wide blanket purchase agreements. Implementing Electronics Stewardship goals has been, and continues to be, a collaborative effort between the USDA offices of information technology, environmental policy, personal and real property, procurement, and facilities management.

When E-Gov, Executive Office of the President, called for a Federal Data Center Consolidation Initiative in early 2010, the USDA Office of the Chief Information Officer (OCIO) took the lead. OCIO conducted an inventory of all data centers and server rooms, and completed in FY2010 the USDA Data Center Consolidation Plan (DCCP,) which laid out a timeline for consolidation. Since over 90 percent of the data centers are metered, USDA was able to get baseline power usage while performing the inventory. As a result of the DCCP, OCIO decided that rather than investing in data centers and server rooms scheduled to be decommissioned, USDA should focus capital investment five Enterprise Data Centers (EDC). USDA contracted the services of Lawrence Berkley National Laboratory to evaluate its EDCs and make recommendations for energy saving through investment in green technologies. The EDCs implemented most of these recommendations, which we documented in our SSPP of June 2010, driving down the EDCs Power Usage Effectiveness (PUE) ratio. Furthermore, USDA is working with EPA on the analysis of the primary disaster recovery EDC, and looks to gain Energy Star certification for that site in late 2011.

Positions

Enterprise Data Centers are appropriately staffed to support data center consolidation and cloud initiatives and will augment staff, as needed, with contract support to cover the surge in staff hour requirements related to actual migrations of applications and data center closure.

Planning Table

ELECTRONIC STEWARDHIP & DATA CENTERS	Unit	FY 10	FY 11	FY 12	FY 13	FY14	FY15
% of electronic product acquisition covered by current Energy Star specifications that must be energy-star qualified	%	85	90	95	100	100	100
% of covered electronic product acquisitions that are EPEAT- registered	%	96	96	96	96	96	96
% of covered electronic product acquisitions that are FEMP- designated	%	85	90	95	100	100	100
% of agency, eligible PC, Laptops, and Monitors with power management actively implemented and in use	%	30	50	75	100	100	100
% of agency, eligible electronic printing products with duplexing features in use	%	30	40	50	75	95	100
% of electronic assets covered by sound disposition practices	%	100	100	100	100	100	100
% of agency data centers independently metered, advanced metered, or sub-metered to determine monthly (or more frequently) Power Utilization Effectiveness (PUE).	%	40	90	95	100	100	100
Reduction in the number of agency data centers	#	46	32	26	20	10	5
% of agency data centers operating with an average CPU utilization greater than 65%	%	10	50	75	75	75	75
Maximum annual weighted average Power Utilization Effectiveness (PUE) for agency.	#	1.9	1.8	1.7	1.6	1.5	1.4

Status

USDA continues to meet OMB targets for the goals of procuring EPEAT products, extending the life of computers to four years, and using environmentally sound practices for excess and surplus electronics. USDA is also 90 percent compliant with the purchase of Energy Star-qualified and FEMP-designated products, thanks to Blanket Purchase Agreements that provide only compliant electronics (including EPEAT.) However, USDA has not met OMB targets for power management. Currently, USDA applies power management (PM) to about 30 percent of desktops and laptops, not the 100 percent OMB requires. USDA's strategy for full PM implementation involves an application known as BigFix, which the OCIO deployed to all Department computers and servers in early FY 2011. Using BigFix, USDA has obtained a baseline of computer power usage and is capable of enabling PM from the OCIO level. However, the decentralized nature of IT administration in USDA, in which 29 USDA agencies and offices have their own CIO, has precluded OCIO from unilaterally implementing PM. Current projections are that USDA will fully implement PM by the end of FY2013.

OMB approved USDA's Data Center Consolidation Plan (DCCP) in August 2010. The DCCP establishes a timeline for consolidation of the current data centers from 46 to five Enterprise Data Centers (EDC). Eleven of the 29 agencies and offices have consolidated, or are in the process of consolidating, their server rooms and data centers to EDCs. The remaining 18 USDA agencies are projected to consolidate their data centers to EDCs in the FY 2011 through FY 2014 timeframe. This consolidation is occurring at the same time that the EDCs have improved their energy efficiency. Currently, the EDCs have a combined Power Usage Effectiveness (PUE) of 1.69, which is within the

EPA-recommended level of 1.7 by FY2 011. The EDCs are well positioned to meet the OMB-mandated PUE target of 1.4 by FY2 015.

USDA is also moving some services to a cloud platform, an activity that further reduces USDA's need for additional hardware, building space, and energy. In FY2 010 USDA developed a matrix shown in the table below to assist in determining candidates for cloud computing.

Candidates for cloud computing							
Workload Type	Key Differentiators						Recommended Cloud Approach
	Scalability/Elasticity	Price Sensitivity	Integration Complexity	System Categorization		Security	
				Confidentiality + Integrity *	Availability	Authentication and Audit Controls *	
Group 1	Moderate/High	High	Low	Low	Low/Moderate/High	Low	Public or Hybrid with Public Cloud Computing Offering
Group 2	Low/Moderate/High	Moderate/High	Moderate	Moderate/High	Moderate/High	Moderate/High	Private or Community Cloud Computing Offering
Group 3	Low/Moderate	Low/Moderate	High	High	Moderate/High	High	Not recommended for Cloud Computing
* Note: Applications with High requirements for Confidentiality, Integrity or Security Controls are not candidates for Public Cloud Computing Offerings.							

USDA is taking advantage of multiple cloud-based computing services, including for content delivery networks and e-mail applications, in accordance with OMB guidance. According to Mr. Vivek Kundra, Federal CIO:

“When evaluating options for new IT deployments, OMB will require that agencies default to cloud-based solutions whenever a secure, reliable, cost-effective cloud option exists. To facilitate this shift, we will be standing up secure government-wide cloud computing platforms.”

(Source: *25 Point Implementation Plan to Reform Information Technology*, Office of Management and Budget, Executive Office of the President, 9 December 2010.)

Return on Investment

USDA EDCs are fee-for-service to all the Federal Government and therefore have established Service Level Agreements for their catalog of services. These EDCs are working capital fund entities governed by a working capital fund executive board and technical review board comprised of USDA Agency CIOs and CFOs.

The data center consolidation project will be specifically managed by the USDA's Data Center Operations, which reports to the USDA CIO. The EDCs follow Information Technology Infrastructure Library and Project Management Institute guidelines and best practices.

USDA has established and sustained IT governance at the Department and its agencies to:

- Eliminate redundant spending / solutions on commodity software, infrastructure and operations through the use of an Acquisition Approval Request process.
- Eliminate isolated systems solutions through the implementation of Department-wide Enterprise Services including e-mail, portal, web services, web content management services, etc.
- Develop a common set of measures as a basis for executive decisions on infrastructure and data centers (e.g. server utilization, average virtualization, and power usage efficiency) reported by Data Center operations to the CIO via an executive dashboard.

Additional Highlights

- Starting in FY2 009 and continuing to the present, USDA procures EPEAT-registered products for over 95 percent of new computers and laptops.
- 100 percent of USDA excess and surplus electronics are screened and processed through the Agency Asset Management System on the GSAXcess website. Those electronics that are not transferred, donated, or sold at auction are 100 percent recycled with UNICOR in the National Capital Area (NCA). NCA reported 126 tons of electronics recycled by UNICOR in FY09. Besides donating thousands of computers per year to schools, USDA also transfers computers and scientific equipment to land grant universities.
- USDA installed a virtual tape system that allowed the decommissioning of inefficient EDC tape drives, eliminating approximately 800,000 tapes and freeing up 6,000 square feet of space.
- USDA is making steady progress in moving from a physical server per application model of operation to a model where multiple applications reside on a single server through the use of virtualization. USDA is closely monitoring central processing unit utilization rates in these virtualized server environments to ensure average utilization rates are in the 60 to 70 percent range.
- As data center consolidation proceeds, USDA projects a 40 percent reduction in data center energy usage in FY 2015 compared with FY 2010.

GOAL 8 - Agency Innovations & Government-Wide Support

Description

USDA will pursue innovative initiatives, projects, practices, and partnerships that promote and achieve sustainability

Leadership

The USDA SOC, chaired by the USDA SSO, is responsible for overseeing the overall objectives and goals of EO 13514. There are five workgroups under the direct leadership of the SOC: Environmental Management, Transportation, Facilities, Green Purchasing and Electronic Stewardship. There is no one SOC workgroup that leads this goal because it is a vital piece of every goal. Emphasis on fostering new innovative ideas and technology is critical to reaching our sustainability goals.

Implementation Methods

USDA SOC will create an environment that recognizes new innovative ideas for achieving sustainability by:

- Providing opportunities during Council meetings for agencies to showcase their successes
- Publishing projects or initiatives on our green website or utilizing other forms of networking to share success stories
- Develop a system to recognize leaders in sustainability

Positions

USDA anticipates that it will utilize current staffing.

Status

USDA strives to share and collocate offices that make our space management more efficient as demonstrated in DR1620 and the USDA Real Property Leasing Handbook (referenced below).

DR1620 - *Space Management Policy* - "US Departmental policy is to be implemented whenever entering into a new or expanded GSA assignment, new or superseding USDA lease, space reduction action, or other space action resulting in significant space changes in owned or leased space as follows: when two or more field office agency locations are in the same community or geographical area, collocation will occur whenever practical. Agencies will take advantage of all space actions to increase participation in collocations. A request for an exception to the collocation policy will be signed by all agencies involved, forwarded through the lead agency's Director, Assistant Secretary Director (ASD), who coordinated with the affected agencies' Directors, ASD, prior to submitting the request to Office of Procurement and Property Management (OPPM) for a decision."

USDA is also involved in numerous innovative initiatives, projects, practices and partnerships that promote and achieve sustainability. The following examples showcase USDA's recent success in the area of "innovative sustainability."

1) Bio-energy

The reclamation of energy from woody biomass is being addressed in the Southern Research Station through the use of an integrated gasification-combustion-electricity generation unit. The system can gasify wood chips, pellets, nut shells or other carbonaceous material, combust the gas and generate up to 25kW of electricity. In addition, efforts are underway to convert the gas to liquid transportation fuels such as synthetic diesel or ethanol, using catalytic and microbiological methods, respectively.

Through the efforts of all Deputy Chief areas (National Forest System, State and Private Forestry, and Research and Development), this unit has been installed on the Winn Ranger District of the Kisatchie National Forest, and will be used for research, demonstration/technology transfer and to offset electricity costs on the district. The woody biomass be analyzed in this system will include logging debris, understory material and other currently underutilized biomass, the removal of which will contribute to both energy independence and forest health. Efforts are also underway to address the applicability of similar systems in municipalities by evaluating negative-value urban feedstocks such as firebreak debris, residential construction waste, and agricultural waste. The data collected in this study will be beneficial to landowners, small business owners, and municipalities to help determine the feasibility and applicability of local biomass-to-energy projects.

2) BioPreferred

USDA has the responsibility of directing the efforts of the Federal government to increase the use of renewable, sustainable biobased industrial products made from agricultural, forestry and marine materials. Increasing the use of biobased products will stimulate economic development and have positive climate change impacts. The BioPreferred program housed in Departmental Management oversee the program that designates biobased products for Federal procurement preference to help grow the biobased industry.

Over 5,100 designated products in 50 categories are included thus far in this program. USDA has created training modules to assist other agencies in implementing the program and has model contract language on BioPreferred.gov to allow contract officers to download and use these templates when making procurement decisions. The BioPreferred program also offers training at major Federal events including GSA Expo, GSA Smart Pay, and Gov Energy as well as on-going training at Federal facilities in Washington, DC. The Federal Acquisition Institute now has biobased information in its procurement training and the Defense Acquisition University is adding similar modules.

In January 2011 the BioPreferred program unveiled a new consumer label designed to increase awareness and use of biobased products in the private sector. Through an independent third party, USDA certifies the minimum biobased content of products in the marketplace as “USDA Certified Biobased Products.” The image below is USDA’s new consumer label for use in the private sector.



3) Centralized Excess Property Operation

The Centralized Excess Property Operation (CEPO) is located in Beltsville, Maryland and provides efficient on-demand cost competitive property disposal services throughout the Washington Metropolitan Area for 32 USDA and 13 non-USDA agencies and offices. Executive agencies must, to the maximum extent practicable, fill requirements for property by using existing agency property or by obtaining excess property from other Federal agencies in lieu of new procurements. CEPO offers surplus personal property, such as furniture, used computers, electronic equipment, and various motor vehicles for use elsewhere within USDA. If there is no need for the property within USDA, USDA declares the property “excess” and reports it to the GSA for possible transfer to eligible Federal recipients for direct use or for use by their contractors, project grantees, or cooperative agreement recipients.

If GSA determines that there are no Federal requirements for the excess property, it becomes surplus property and is available for donation to State and Local Government agencies and other eligible non-Federal activities. CEPO is an active participant in the Computers for Learning (CFL) program under EO 12999, Educational Technology: Ensuring Opportunity for all Children in the Next Century. The Computers for Learning initiative permits the donation of excess computer equipment from USDA and the 13 other Federal agencies serviced by CEPO in the Washington Metropolitan area to be donated to Educational Institutions in support of grades K4 through grade 12. CEPO also manages an inventory of furniture that is rehabilitated which offers USDA agencies a savings of at least 40 percent over cost of new furniture purchases. Excess personal property not reutilized or transferred/donated is auctioned to the general public through the CEPO Sales Center or recycled through various recycling contracts or agreements.

4) Facilities Management System

ARS is piloting a business improvement initiative called the Facilities Management System (FMS), a database and dashboard software to track utilities in a user friendly and graphical form for field personnel. The FMS intention is enabling locations and Areas to benefit from rolled-up, synthesized facilities operations costs data, and share operational insights and best practices across locations and Areas.

5) Education & Outreach

The FS has several robust outreach strategies that enhance understanding and appreciation for natural resources through “hands on” learning. The FS has executed formal partnership with three diverse schools, reaching over 5,000 students to promote lifelong learning about the environment. All schools instituted recycling programs, including installation of solar trash compactors.

6) Award Programs

Each year, the FS funds innovative projects through its Sustainability Operations Award’s program. This year’s winners include the Wenatchee FS Lab Green Team, who created a People’s Garden project that included xeriscaping to reduce the amount of water needed to maintain that landscaping around the lab and lowering the cost of water consumption. The project also included a vegetable garden that allowed the donation of 2,500 pounds of fresh vegetables to local organizations. The Shasta-Trinity National Forest Green Team’s initiatives generated environmental successes through combining energy and water audits and retrofits, resulting in an estimated cost savings to the FS of nearly \$23,000 annually.

7) Decreasing the reliance on fossil fuels and energy consumption

The RD Utilities Programs, under the Rural Electrification Act of 1936, as amended, is able to finance projects developed by eligible non-profit utility organizations, such as electric cooperatives and public utility districts, but cannot provide capital to individuals. RD is currently pursuing options for eligible organizations to develop renewable energy, and has financed biomass, photovoltaic, and wind powered renewable energy projects developed by current borrowers.

Section III Agency Self Evaluation

Question	Ans.
Does your Sustainability Plan incorporate and align sustainability goals, GHG targets and overarching objectives for sustainability with the Agency Strategic Plan?	Yes
Does it provide annual targets, strategies and approaches for achieving the 2015 and 2020 goals?	Yes
Is the Sustainability Plan consistent with the FY2012 President's Budget?	Yes
Does the Sustainability Plan integrate all statutory and Executive Order requirements into a single implementation framework for advancing sustainability goals along with existing mission and management goals, making the best use of existing and available resources?	Yes
Does your plan include methods for obtaining data needed to measure progress, evaluate results, and improve performance?	Yes

Other Key Questions for 2011

Question #1: Did your agency meet by 12/30/10 due date and/or is it now able to demonstrate comprehensive implementation of the EO 13423 Electronic Stewardship goals?

- Acquire at least 95 percent EPEAT-registered electronics
- Enable energy star or power management features on 100 percent of eligible PCs
- Extends the life and/or uses sound disposition practices for its excess or surplus electronics

(If these goals have not been met and demonstrated, then agency should describe its plan and milestones to demonstrate full compliance.)

Answer: By December 30, 2010, USDA met the OMB targets for the goals of procuring EPEAT products, extending the life of computers, and using environmentally sound practices for excess and surplus electronics. USDA is 96 percent compliant with the purchase of EPEAT-registered products, thanks to Blanket Purchase Agreements that provide only compliant electronics (including Energy Star and FEMP.) 100 percent of USDA excess and surplus electronics are screened and processed through the Agency Asset Management System on the GSAXcess website. USDA has memoranda of agreement with UNICOR for electronics refurbishing and recycling services. However, USDA has not met OMB targets for power management.

Currently, USDA applies power management (PM) to about 30 percent of desktops and laptops. USDA's strategy for full PM implementation involves an application known as BigFix, which the OCIO deployed to all Department computers and servers in early FY2011. Using BigFix, USDA has obtained a baseline of computer power usage and is capable of enabling PM from the OCIO level. However, the decentralized nature of IT administration in USDA, in which 29 USDA agencies have their own CIO, has precluded OCIO from unilaterally implementing PM. Current projections are that USDA will fully implement PM by the end of FY2013.

Question #2: Is your agency tracking and monitoring all of its contract awards for inclusion of requirements for mandatory Federally-designated green products in 95 percent of relevant acquisitions? (If it is finding non-compliance issues, then it should identify corrective actions the agency is taking this year to demonstrate compliance with the 95 percent sustainable acquisition goal by the end of FY2012.)

Answer: USDA is reviewing about 40 percent of applicable contracts every quarter to determine the degree to which USDA agencies are placing therein appropriate sustainable product language. Even though over 95 percent of reviewed contracts have some sustainable language in them, USDA is currently fully compliant with sustainable language in about 75 percent of the contracts. That is to say, some contracts contain some, but not all, of the applicable sustainable product language and clauses. USDA developed a spreadsheet that categorizes contracts by service or product type and documents level of compliance (or non-compliance) and corrective actions needed, if applicable. The Sustainable Acquisition Program Manager communicates the review findings to the rest of USDA through the Green Purchasing Workgroup, whose members disseminate the information to USDA agency requirements and contract officials.

USDA promotes the fully compliant contracts as success stories and shares them on websites and policy documents. Another key component of attaining 95 percent compliance is awareness training. In this regard, USDA developed a training course that covers the six required product categories and posted the course in FY2010 to AgLearn, USDA's official online training program. Currently, the training is voluntary, but USDA plans to make the sustainable acquisition training mandatory for contracting staff in FY2012. Finally, USDA will target those regions, areas, and offices that are still lacking compliance in FY2013 in order to correct deficiencies. In summary, through a combination of shared review findings, publicized success stories, required sustainable acquisition training, and focused guidance, USDA has determined that it can accomplish the 95 percent goal of full compliance by FY2014.

Question #3: Has your agency completed energy evaluations on at least 75 percent of its facilities? (If agency has not met this goal, then it should describe plans for catching up on this requirement in the next 6 months.)

Answer: USDA is on schedule to complete energy evaluations on at least 75 percent of "covered facilities" by June 30, 2011.

Question #4: Will your agency meet the deadline of October 1, 2012 (EPACT'05 Sec 103) for metering of energy use? (Agency should provide current status of buildings metered and plans for meeting the deadline).

Answer: USDA is on track to meet the October 1, 2012 deadline for metering of electricity in accordance with EPACT 2005 Section 103. As of the end of FY 2010, advanced electricity meters were installed in approximately 63 percent of applicable USDA buildings.

Question #5: If your agency reports in the FRPP, will it be able to report by December 2011 that at least 7 percent of its inventory meets the High Performance Sustainable Guiding Principles? (If no, agency needs to provide schedule and plan for actions to be taken in the next six months.)

Answer: At this time USDA appears likely to meet the seven percent goal, given continued progress in assessing the existing building inventory and the recent addition of several high performance buildings to USDA's existing inventory.

Appendix 1: Acronyms

Acronym	Description
A-E	Architectural and Engineering
AFV	Alternative Fuel Vehicle
AMS	Agricultural Marketing Service
APHIS	Animal Plant and Health Inspection Service
ARRA	American Recovery and Reinvestment Act of 2009
ARS	Agricultural Research Service
BARC	Beltsville Agricultural Research Center
BPA	Bonneville Power Administration
BPAs	Blanket Purchase Agreements
BTU or Btu	British Thermal Unit
C&D	Construction and Demolition
CCPI	Cooperative Conservation Partnership Initiative
CEQ	Council on Environmental Quality
CMAVE	Center for Medical, Agricultural and Veterinary Entomology
CPU	Central Processing Unit
CRAC	Computer Room Air Conditioning
D.C.	District of Columbia
DM	Departmental Manual
DOE	Department of Energy
DoN	Department of the Navy
DR	Departmental Regulation
EDCs	Enterprise Data Centers
EISA	Energy Independence and Security Act
EMS	Environmental Management System
EO	Executive Order
EPAct	Energy Policy Act
EPCRA	Emergency Planning and Community Right-to-Know Act
EPEAT	Electronic Product Environmental Assessment Tool
ESPC	Energy Savings Performance Contract
EUI	Energy Use Index
EUL	Enhanced Use Lease
FEMP	Federal Energy Management Program
FNS	Food and Nutrition Service
FPDS	Federal Procurement Data System
FS	Forest Service
FSA	Farm Service Agency
FY	Fiscal Year
gal	gallon
GGE	Gasoline Gallon Equivalent
GHG	Greenhouse Gas
GIPSA	Grain Inspection, Packers, & Stockyards Administration

GPAPP	Green Purchasing Affirmative Procurement Plan
GPRA	Government Performance and Results Act
GSA	General Services Administration
GSF	Gross Square Feet
GWCC	George Washington Carver Center
GYA	Greater Yellowstone Area
HQ	Headquarters
HVAC	heating, ventilating, and air conditioning
IT	Information Technology
LCCA	Life Cycle Cost Analysis
LEED	Leadership in Energy and Environmental Design
LID	Low Impact Development
MMTCO _{2e}	Million Metric Tonnes of Carbon Dioxide Emissions
MOU	Memorandum of Understanding
mpg	miles per gallon
MRP	Marketing & Regulatory Programs
MWA	Megawatt-hours
NADC	National Animal Disease Center
NAL	National Agricultural Library
NEPA	National Environmental Policy Act
NRCS	National Resources Conservation Service
O&M	Operations and Maintenance
OCE	Office of the Chief Economist
OCIO	Office of the Chief Information Officer
OMB	Office of Management and Budget
PPA	Power Purchase Agreement
PUE	Power Usage Efficiency
REAP	Rural Energy for America Program
RECs	Renewable Energy Certificates
RIA	Regulatory Impact Analysis
ROI	Return on Investment
RPO	Real Property Officer
RSS	Really Simple Syndication
SF	Square Feet or Square Footage
SNAP	Significant New Alternatives Policy
SOC	Sustainable Operations Council
SSO	Senior Sustainability Officer
SSPP	Strategic Sustainability Performance Plan
TRI	Toxics Release Inventory
UESC	Utility Energy Services Contract
UPS	Uninterruptible Power Supply
USDA	United States Department of Agriculture
USGBC	United States Green Building Council
WES	Washington Gas Energy Services