1.1 What is the purpose of this chapter? This chapter establishes policy for implementing sustainable practices and achieving the Service's goal of carbon neutrality by 2020 through management of activities that impact the environment, energy, and transportation.

1.2 What is the Service's policy?

A. It is our policy to carry out our responsibilities in a manner that:

(1) Protects human health and the environment;

(2) Meets or exceeds the requirements of all applicable environmental laws, regulations, Secretarial Orders, Executive Orders, and policies; and

(3) Moves us toward carbon neutrality, consistent with the Service's Draft Strategic Plan for Responding to Accelerating Climate Change (referred to as the Strategic Plan) and Draft Appendix: 5-Year Action Plan for Implementing the Climate Change Strategic Plan (referred to as the Action Plan). Carbon neutrality means using practices to avoid greenhouse gas emissions, minimize unavoidable emissions, and offset remaining emissions. Our goal is to be a carbon neutral organization no later than 2020.

B. We expect our employees, contractors, partners, and volunteers to demonstrate an awareness and understanding of the interdependency of the ecosystems, resources, biodiversity, and human culture entrusted to our stewardship.

1.3 How will the Service achieve its goal of carbon neutrality? We must:

A. Comply with Federal requirements, the Service's Strategic and Action Plans, and other policies identified in Exhibit 1;

B. Use sustainable approaches at all levels for activities such as those identified in Table 1-1.

Table 1-1: Activities Where We Can Use Sustainable Approaches

Category	Activities
Minimizing Energy Use	• Minimizing energy consumption (energy intensity) and moving toward eliminating the use of fossil fuels; • Increasing the use of renewable energy; • Using high performance sustainable building design, construction, operation and management, maintenance, and deconstruction; • Managing electronic assets in an environmentally sound and energy efficient manner throughout their life cycle; and • Improving efficiencies in our fleet and transportation management.
Better Planning	• Reducing or eliminating the quantity of toxic and hazardous chemicals and materials we acquire, generate, use, and dispose of; • Participating in regional and local integrated planning; • Reducing pollution; • Implementing formal Environmental Management Systems (EMS) at all appropriate organizational levels (also see section 1.9); • Increasing the diversion of solid waste and maintaining cost-effective waste prevention and recycling programs in Service facilities; • Improving wastewater management;

Table 1-1: Activities Where We Can Use Sustainable Approaches	
Category	**Activities**
	• Reducing domestic water consumption; and • Reducing agricultural and industrial water consumption.
Work Practices	• Advancing sustainable acquisition of goods and services; • Implementing sustainable landscaping practices; • Promoting workforce practices that minimize greenhouse gas emissions; • Ensuring we have environmental leaders in our organization; and • Ensuring our concession and commercial visitor service operators conduct sound environmental management.

C. Find controls that will help us manage risks to the environment while minimizing impacts on mission capability and business costs. If Service employees, contractors, partners, or volunteers take an action that may have an environmental impact, we must make sure it is mission critical or "necessary and appropriate."

1.4 What are the authorities for and plans and strategies that affect this chapter?

A. The authorities for this chapter are:

(1) Executive Order 13514, Federal Leadership in Environmental, Energy, and Economic Performance.

(2) Executive Order 13423, Strengthening Federal Environmental, Energy, and Transportation Management (codified by Section 748 of the Omnibus Appropriations Act of 2009 (P.L. 111-8)), and Instructions for Implementing the Order.

(3) Executive Order 12088, Federal Compliance with Pollution Control Standards.

(4) Executive Order 13112, Invasive Species.

(5) Executive Order 13150, Federal Workforce Transportation.

(6) Executive Order 13212, Actions to Expedite Energy-Related Projects.

(7) Executive Order 13221, Energy Efficient Standby Power Devices.

(8) "Sustainable Building Implementation Plan," Department of the Interior.

(9) "Guiding Principles for Federal Leadership in High Performance and Sustainable Buildings," Memorandum of Understanding.

(10) Treasury, Postal Service, and General Government Appropriations Act, 1995 (P.L. 103-329 Sec. 608).

(11) National Energy Conservation Policy Act of 1992, as amended, Section 301.

(12) Energy Policy Act of 2005 (EPACT, P.L. 109-58).

(13) Energy Independence and Security Act of 2007 (EISA) (P.L. 110-140).

(14) 515 DM 2, Environmental Auditing.

(15) 515 DM 4, Environmental Management Systems.

(16) Secretarial Order No. 3226, Evaluating Climate Change Impacts in Management Planning.

(17) Secretarial Order No. 3289, Addressing the Impacts of Climate Change on America's Water, Land, and Other Natural and Cultural Resources.

B. Plans and strategies that directly affect this policy are:

(1) "Draft, Rising to the Challenge, Strategic Plan for Responding to Accelerating Climate Change," (referred to as the Strategic Plan), U.S. Fish and Wildlife Service.

(2) "Draft, Appendix: 5-Year Action Plan for Implementing the Climate Change Strategic Plan," (referred to as the Action Plan), U.S. Fish and Wildlife Service.

(3) "Electric Metering Implementation Plan," U.S. Fish and Wildlife Service.

1.5 What terms do you need to know to understand this chapter?

A. Carbon Footprint: The Service's carbon footprint is the total amount of greenhouse gases we emit to the atmosphere each year. A carbon footprint usually includes both direct and indirect emissions, and generally is expressed in equivalent tons of carbon dioxide (CO_2) (see sections 1.7 and 1.8).

B. Carbon Neutral: Carbon neutral means having a net zero carbon footprint (i.e., it is achieving net zero carbon emissions by balancing a measured amount of carbon released with an equivalent amount that is sequestered). Our goal is to be a carbon neutral organization no later than 2020.

C. Carbon Sequestration: Carbon sequestration is the process through which agricultural and forestry practices remove carbon dioxide from the atmosphere.

D. Carbon Sink: A carbon sink occurs when carbon sequestration is greater than carbon releases over a specified period of time.

E. Environmental Management System (EMS): An EMS is a set of processes and practices that enable an organization to increase its operating efficiency, continually improve overall environmental performance, and better manage and reduce its environmental impacts, including those environmental aspects related to energy and transportation functions (see section 1.9). The EMS standard is in ISO 14001:2004(E). An EMS requires that we use a standard process to identify and prioritize current activities, establish goals for reducing impacts to the environment from our activities, implement plans to meet the goals, evaluate progress, and make continual improvement.

F. Greenhouse Gases: Greenhouse gases are carbon dioxide, methane, nitrous oxide, hydrofluorocarbons, perfluorocarbons, and sulphur hexafluoride (CO_2, CH_4, N_2O, HFCs, PFCs, and SF_6). The most common of these is carbon dioxide.

G. Integrated Planning: Integrated planning is a method of planning local and regional development that addresses protection of the environment as well as community wellbeing and economic development.

H. Renewable Energy: Renewable energy is produced by solar, wind, biomass, landfill gas, ocean (including tidal, wave, current, and thermal), hydrokinetic, geothermal, municipal solid waste, or new hydroelectric generation capacity achieved from increased efficiency or additions of new capacity at an existing hydroelectric plant (e.g., microhydroturbines at fish hatcheries).

I. Solid Waste Diversion: Solid waste diversion is when we keep non-hazardous solid waste out of a disposal facility. Waste prevention, reuse, composting, mulching, recycling, and donation are waste diversion methods.

J. Sustainable Building: Sustainable building is an integrated, synergistic approach to construction that considers all phases of a facility's life-cycle. Its purpose is to:

(1) Avoid depletion of energy, water, and raw materials;

(2) Prevent environmental degradation caused by facilities and infrastructure; and

(3) Build environments that are livable, comfortable, safe, and productive.

K. Zero Net Energy Buildings: Zero net energy buildings are commercial buildings that produce as much energy as they use over the course of a year.

1.6 Who implements this chapter and what are their responsibilities? Table 1-2 describes the responsibilities employees have for implementing sustainable practices.

Table 1-2: Responsibilities for the Service's Sustainability Program

This official…	Is responsible for…
A. The **Director**	**(1)** Developing the Service's overall sustainability plan and implementation of governing authorities; **(2)** Developing carbon neutral goals as described in our Climate Change Action Plan, including identifying and requesting resources and funding; and **(3)** Designating a Senior Sustainability Officer to implement these programs.
B. The **Assistant Director, Business Management & Operations (AD-BMO)**	**(1)** Providing guidance to Service employees about environment, energy, and transportation management requirements; **(2)** Establishing a Washington Office integrated sustainability team. This team should include representatives from the contracting, facilities, fleet management, environmental compliance, engineering, construction, and real property asset management functions. The team also may include experts from other areas, such as legal, energy management, safety, maintenance/facility management, human resources, and finance; **(3)** Developing and sending to the Department of the Interior our annual reports for energy management, water conservation, transportation and fleet management, and quarterly Internal Scorecard Reports for transportation management, environmental stewardship, and energy management; and **(4)** Co-chairing, with the Region 1 Regional Director, our Carbon Neutral Team. This team assesses and identifies strategies that support achieving carbon neutrality by 2020. (See the Strategic and Action Plans for Climate Change for

Table 1-2: Responsibilities for the Service's Sustainability Program	
This official…	**Is responsible for…**
	more information about the priorities of this team.)
C. The **Assistant Director, Information Resources and Technology Management (IRTM)**	**(1)** Establishing policy and technical assistance for Service employees about sustainability requirements for managing information technology resources; **(2)** In coordination with the Divisions of Contracting and Facilities Management and Engineering, maintaining and implementing the Electronic Stewardship Implementation Plan; **(3)** Providing a liaison to the Department of the Interior and the Federal community for electronic stewardship; **(4)** Providing technical assistance and training to support our strategies to reduce the impact of operational practices (e.g., using webcasts and other technological alternatives to employee travel); and **(5)** Providing quarterly updates on the progress of implementing the Electronic Stewardship Implementation Plan to the AD-BMO so the AD-BMO can include it on the Department of the Interior Environmental Stewardship Scorecard.
D. The **Assistant Director, Budget, Planning and Human Capital**	**(1)** Providing policy that promotes workforce practices that reduce our carbon footprint (e.g., telework policy); and **(2)** Ensuring that policies are in place that require sustainability to be included in the performance standards of all employees.
E. Assistant Directors	**(1)** Providing staff to participate in integrated sustainability teams as needed; **(2)** Providing resources or financial support to implement EMSs; and **(3)** Helping the AD-BMO collect data for reporting and strategic planning.
F. Regional Directors	**(1)** Implementing guidance that complies with governing authorities and policy and with the Service's Action Plan to maximize performance measured on the Organizational Assessment Scorecards; **(2)** Providing staff to: **(a)** Gather required data, **(b)** Develop and carry out energy, environment, construction, and transportation management activities and reporting, and **(c)** Conduct environmental audits and assessments and report on recycling, acquisition, energy and water use and conservation, environmental compliance, environmental management, and sustainable construction and rehabilitation; **(3)** Routinely reviewing and taking corrective actions, if necessary, to ensure that the decisions and actions of employees are consistent with environmental, energy, and transportation management, and other sustainable policies;

Table 1-2: Responsibilities for the Service's Sustainability Program	
This official…	**Is responsible for…**
	(4) Providing resources essential to establish, implement, maintain, and improve EMSs at appropriate facilities; **(5)** Developing renewable energy options consistent with the Action Plan; **(6)** Establishing integrated sustainability teams (e.g., green teams identified in the Action Plan); **(7)** Nominating exemplary stewardship accomplishments for recognition through the Service's Environmental Leadership Awards program, and providing representatives to the selection panel if requested (see section 1.13 and Exhibit 2); and **(8)** Participating in Regional integrated planning efforts.
G. The **Chief, Division of Budget**	**(1)** Providing guidance on the budget process to program offices as they incorporate sustainability activities; **(2)** Providing guidance on recycling revenue; and **(3)** Assisting programs in seeking funds to implement measures that reduce our carbon footprint.
H. The **Chief, Division of Engineering**	**(1)** Providing policy, technical assistance, and guidance for reporting on environmental, energy, and water management; sustainable construction and rehabilitation; EMS; and environmental compliance; **(2)** Supporting IRTM and Contracting and Facilities Management on issues related to sustainability and electronic resource management; **(3)** Identifying, developing, and administering training tools and resources for environmental, energy, and construction management; **(4)** Providing liaison to the Department of the Interior and the Federal community for environmental compliance, energy, water, and construction management; **(5)** Annually reporting on energy management and conservation programs; and **(6)** Annually administering our Environmental Leadership Awards program and facilitating our participation in awards programs that the Department of Energy and the Department of the Interior manage (see section 1.13 and Exhibit 2).
I. The **Chief, Division of Contracting and Facilities Management**	Considering the Service's sustainability goals when: **(1)** Providing policy, technical assistance, and guidance for reporting on acquisition, electronics, recycling, and transportation management; **(2)** Collecting data needed to assess Service performance in the areas of recycling, acquisition, leased assets, and transportation management; **(3)** Updating the Service's 5-Year Fleet Plan;

Table 1-2: Responsibilities for the Service's Sustainability Program	
This official…	**Is responsible for…**
	(4) Supporting the AD-IRTM to develop electronic resource management guidance and implement the Electronic Stewardship Implementation Plan; **(5)** Identifying, developing, and administering training tools and resources, including but not limited to training for procurement officials, to promote life-cycle management of acquired goods; and **(6)** Serving as liaison to the Department of the Interior, the Federal community, and external organizations for acquisition, recycling, and transportation management activities.
J. The **Chief, Division of Finance**	Providing financial data to assess resources we expend for travel, acquisition, recycling, transportation, and workforce benefits (e.g., transit benefits) to help us develop strategies that promote a sustainable workforce.
K. Managers and **Supervisors**	Providing leadership and supporting employees' efforts to incorporate sustainable practices in their daily work efforts. This includes helping to coordinate work across program areas.
L. Project Leaders and Facility Managers	**(1)** Designating a Waste Prevention Recycling Coordinator to collect and report on waste diversion, acquisition, and energy data we need for annual reporting and to develop strategic plans to promote sustainable practices; **(2)** Reducing energy and water consumption and increasing the use of renewable energy; and **(3)** For facilities with an EMS, establishing, documenting, implementing, maintaining, and continually improving their EMS (see the Division of Engineering Intranet site for a list of formal EMS facilities and annual requirements). They must also provide declarations of conformance to the appropriate standard at least every 3 years.
M. Waste Prevention Recycling Coordinators	**(1)** Gathering data needed and reporting on acquisition, waste diversion, and recycling; and **(2)** Promoting sustainable practices such as life-cycle acquisition planning and recycling development.
N. Regional Environmental Compliance Coordinators (RECC)	**(1)** Providing technical assistance on environmental compliance and EMS implementation; **(2)** Conducting environmental compliance audits (see 560 FW 7) and EMS audits; and **(3)** Facilitating environmental compliance and management reporting.
O. Regional Energy Managers	Providing technical assistance and coordinating energy reporting.
P. Service employees	**(1)** When making decisions or performing job duties, incorporating practices that promote the Service's sustainability goals (see Exhibit 3); and **(2)** When possible, educating others about environmental leadership.

1.7 How will the Service meet the requirements of Executive Order 13514 and the other authorities governing carbon footprint reduction?

A. To address the requirements of Executive Order 13514 and the Strategic and Action Plans, we have developed an approach that emphasizes adaptation, mitigation, and engagement. Mitigation requires us to reduce emissions and enhance sinks of greenhouse gases. These reductions and enhancements are critical to achieving our carbon neutrality goal by 2020. Key goals from our strategy are provided in Exhibit 1, along with associated regulatory requirements. We organized Exhibit 1 by sustainable practice category (e.g., contracting and sustainable acquisition, electronics stewardship, energy efficiency, etc.).

B. To reduce greenhouse gas emissions, we must develop and implement best practices not only in natural resource management, but also in our daily operations. We want to reduce greenhouse gases from emissions sources:

(1) We own or control (e.g., natural gas, propane, etc. to condition our buildings, and emissions from vehicles);

(2) We purchase, such as the generation of electricity, heat, or steam (e.g., emissions when we consume electricity at a fish hatchery or wildlife refuge); and

(3) We do not own or control (e.g., employee business travel, employee commuting, and procurement of goods).

1.8 How did the Service establish and how will it continually assess its carbon footprint and make adjustments to reach carbon neutrality?

A. Using fiscal year 2008 data, we established a baseline, measured in CO_2 equivalents. We use this information to:

(1) Identify areas to focus on to reduce our greenhouse gas emissions; and

(2) Consider our capacity to sequester or store carbon (also measured in tons of CO_2 equivalents). Ultimately, our goal is to implement sustainable practices that reduce our carbon footprint to a sufficiently low level so that it balances our sequestration.

B. We will reassess our greenhouse gas emissions annually to ensure we are on track to reach our carbon neutral goal by 2020. As much as possible, we rely on data we collect for existing Federal and Departmental reports to make these assessments. Examples of existing reports are provided in Exhibit 1.

C. We may use other sources of information, such as the systems we use to document procurement and travel (IDEAS and GovTrip) to assess our footprint and to eliminate the need for additional data calls.

1.9 How does having an EMS at a facility impact our sustainability efforts?

A. We instituted EMSs at a number of our large, complex facilities in accordance with E.O. 13514, E.O. 13423, and 515 DM 4, and consistent with ISO 14001:2004 (see the Division of Engineering intranet site for list of facilities).

B. Implementing EMSs at these facilities gives us a systematic way to identify environmental impacts from operational activities and to set facility-specific goals and targets for sustainability. At these facilities we annually review progress and create or update goals. (See the Division of Engineering's Intranet site for a list of EMS annual requirements). These facilities model the approach we are taking to develop, implement, and annually update our plans to achieve sustainability.

1.10 Are there other programmatic practices that also promote our sustainability goals? We have opportunities to promote sustainability in our land management, planning, financial assistance, environmental education, and communication activities and when we interact with concessioners. Exhibit 2 gives examples of program plans and policies to promote our sustainability goals**.**

1.11 What can individual employees, volunteers, and concessioners do to contribute to our sustainability goals? In addition to the programmatic requirements and resources in Exhibits 1 and 2, Service employees, volunteers, and concessioners can adopt practices that positively affect our sustainability goals (see Exhibit 3).

1.12 What training opportunities are available for employees? Employees can learn more about how to implement sustainable practices from training courses such as those identified in Exhibit 2, section O.

1.13 How does the Service recognize achievements in sustainable practices? We recognize individual, office, and contractor performance and achievements in the areas of environmental compliance and sustainability through the annual awards programs identified in Exhibit 2, section B.

/sgd/ Gregory E. Siekaniec
ACTING DIRECTOR

Date: April 28, 2010