

Reclamation Manual

Policy

Subject:	Sustainable Buildings
Purpose:	This document establishes the Bureau of Reclamation's Policy on sustainable buildings and directs Reclamation management to meet "Guiding Principles," when building, renovating, operating and leasing buildings. The benefits of this Policy include reduced environmental impacts, increased operating efficiencies, and improved indoor building environments.
Authority:	The Energy Independence and Security Act of 2007 (Public Law 110-140), and Executive Order 13423, <i>Strengthening Federal Environmental, Energy, and Transportation Management</i> , January 26, 2007, (E.O. 13423) as amended and supplemented by E.O. 13514, <i>Federal Leadership in Environmental, Energy, and Economic Performance</i> , October 5, 2009, (E.O. 13514).
Approving Official:	Commissioner
Contact:	Director, Policy and Administration, 84-50000

1. **Introduction.** Building construction and operations account for significant environmental impacts, including the consumption of energy, water, and other natural resources; the generation of air pollutants, greenhouse gas emissions, solid and hazardous waste; and the destruction of habitat. To reduce the environmental impact of its 500,000 plus buildings, the Federal Government has made sustainable building practices a top priority. E.O. 13423 codified the [*Federal Leadership in High Performance and Sustainable Buildings Memorandum of Understanding*](#) (MOU) signed by the Department of the Interior and 20 other agencies in 2006. The MOU sets out key "Guiding Principles" for the design, construction, and operation of Federal buildings. E.O. 13514 reinforced and expanded upon E.O. 13423, requiring that: (1) new construction and major renovations of Federal agency buildings comply with the Guiding Principles; and (2) 15 percent of an agency's existing capital asset building inventory greater than 5,000 gross square feet (gsf) incorporates the Guiding Principles by the end of fiscal year 2015. This document establishes Reclamation Policy for meeting Federal sustainable building requirements.
2. **Applicability.** This Policy applies to any executive responsible for managing and operating Reclamation's building assets. The following building categories are addressed by this Policy:
 - A. new building construction at or above the sustainable building threshold;
 - B. major renovation projects at or above the sustainable building threshold;
 - C. existing buildings greater than 5,000 gsf; and

Reclamation Manual

Policy

- D. direct lease¹ agreements for space greater than 5,000 gsf.
3. **Definitions.** For the purposes of this document, the following terms and definitions apply.
- A. **Building.** A building is a structure that occupies space on land, has a roof, is commonly enclosed by walls, usually with flooring, and is designed for storage, human occupancy, or shelter for animals. Buildings include offices, warehouses, schools, housing, and storage units. Buildings do not include dams, power plants, pumping plants, and other such structures where people would not occupy the space if the function (e.g., pumping) was removed. Buildings are a capital asset category in the Federal Real Property Profile (FRPP) database. A complete list of building types can be found in [DOI Asset Types and Asset Codes](#).
- B. **Current Replacement Value.** The current replacement value (CRV) is the standard industry cost and engineering estimate of materials, supplies, and labor required to replace a facility at its existing size and functional capability, and to meet current regulatory codes. The most current CRV for each building is reported in the FRPP.
- C. **Exemptions.** Exemptions are requests to exclude a sustainable building requirement as defined in the Guiding Principles due to feasibility and/or costs. Exemptions are not required where the element addressed by the Guiding Principle requirement does not exist within the building.
- D. **Field Cost.** Field cost is an estimate of the capital costs of a project from award to construction closeout and is the sum of the contract cost and construction contingencies. Construction contingencies account for costs from design changes and/or unexpected site conditions encountered during construction. Non-contract costs are not included in this value. See Reclamation Manual Directive and Standard (D&S), *Cost Estimating*, FAC 09-01, for more details.
- E. **Guiding Principles.** The Guiding Principles for Federal Leadership in High Performance and Sustainable Buildings were first established in the MOU and are updated in the Office of Management and Budget's [High Performance and Sustainable Buildings Guidance](#) (December 1, 2008). The five Guiding Principles are summarized as follows:
- (1) employment of integrated design principles;
 - (2) optimization of energy efficiency and use of renewable energy;
 - (3) protection and conservation of water;

¹Direct leases are those managed directly by Reclamation and do not include leases managed by the General Services Administration.

Reclamation Manual

Policy

- (4) enhancement of indoor environmental quality; and
 - (5) reduction of environmental impacts of materials.
- F. **Historic Buildings.** Buildings either eligible for or listed in the National Register of Historic Places.
- G. **Major Renovation.** A major renovation is a building project that provides opportunities to incorporate sustainable principles into building design and operations to achieve the Guiding Principles. Major renovations often involve the rehabilitation or replacement of building components such as heating/ventilation/air conditioning systems, lighting, roofing, building insulation, building materials, landscaping, etc. Reclamation defines major renovation in accordance with the sustainable building threshold outlined in the [Reclamation Sustainable Buildings Implementation Plan \(SBIP\)](#).
- H. **Reclamation Sustainable Buildings Implementation Plan.** The Reclamation SBIP (February 25, 2010) outlines Reclamation's requirements, roles and responsibilities, strategy, and action plan for incorporating the Guiding Principles into new building construction, major renovations, existing buildings, and direct lease agreements and for meeting third-party certification requirements, where applicable. As sustainable building requirements stem from many sources and are subject to change, the Reclamation SBIP shall be used as the primary reference source of sustainable building requirements as they apply to Reclamation and updated as necessary to capture the latest requirements.
- I. **Secretary of the Interior's Standards for the Treatment of Historic Properties.** The Secretary of the Interior's Standards for the Treatment of Historic Properties (Standards) are intended to promote responsible preservation practices that help protect our Nation's irreplaceable cultural resources. The Standards can be found at <http://www.nps.gov/history/hps/tps/standguide/>.
- J. **Sustainable Building.** A building may be considered sustainable if all of the Guiding Principles are incorporated, and for new construction or major renovations, when it is also certified by a third-party sustainable building rating system.
- K. **Sustainable Building Rating System.** Sustainable building rating systems are tools designed to examine the performance or expected performance of an entire building and convert that examination into an overall assessment for comparison with other buildings. In choosing a rating system for sustainable design and/or operation of a building, Reclamation must select one that results in sound and consistent comparisons, evaluates relevant technical aspects of sustainable design, and is not overly burdensome to implement and explain. One example is the Leadership in Energy and Environmental Design (i.e., LEED) rating and certification system developed by the U.S. Green Building Council.

Reclamation Manual

Policy

- L. **Sustainable Building Threshold.** A sustainable building threshold defines the criteria for identifying newly constructed buildings and major renovation projects required to meet sustainable building requirements and obtain third-party certification from a sustainable building rating system. Sustainable building thresholds are established through statute, regulation, executive order, and Department directive and are based on building size, field cost, CRV, or a combination of these according to legal and executive order requirements. Because sustainable building thresholds are established through multiple authorities and subject to change, Reclamation captures the current sustainable building thresholds in the Reclamation SBIP.
4. **Responsibilities.**
- A. **Reclamation Leadership Team.** The Reclamation Leadership Team (RLT) ensures implementation of this Policy and communicates Reclamation's commitment to sustainable buildings to all applicable Reclamation employees and stakeholders.
- B. **Director, Policy and Administration.** The Director, Policy and Administration, acts as the Executive Sponsor of the Reclamation Sustainable Buildings Team (SBT) and the Reclamation Senior Sustainability Officer. As Executive Sponsor, the Director, Policy and Administration, briefs the Deputy Commissioner, Policy, Administration, and Budget, and the RLT on key issues and recommendations related to sustainable building implementation; tracks and reports Reclamation sustainable building accomplishment through the FRPP and annual sustainable building reports, as required by the Department; and provides staff support to Reclamation's SBT.
- C. **Director, Technical Resources.** The Director, Technical Resources (TR), ensures that designers, including related disciplines of engineering, estimating, operations and maintenance, procurement, etc., have thorough knowledge of sustainable building requirements and apply sustainable building principles in the design, construction, modification, and operation of applicable buildings. The Director, TR, provides representatives to Reclamation's SBT and ensures all applicable D&S, technical manuals, and guidance under his/her responsibility reflects sustainable building requirements.
- D. **Director, Management Services Office.** The Director, Management Services Office (MSO), ensures that all leasing and procurement staff has thorough knowledge of sustainable building requirements and that all applicable procurement contracts for building design, construction, renovation, and leasing meet this Policy. The Director, MSO, provides a representative to the SBT.
- E. **Regional and Program Directors.** Regional directors (RDs) and program directors, or their designees, are responsible for managing Reclamation building assets to ensure that building design, construction, renovation, operation, and leasing within their area

Reclamation Manual

Policy

of responsibility comply with this Policy. The RDs also provide one regional representative and one regional alternate to Reclamation's SBT. Program directors provide a representative to the SBT as described above.

- F. **Sustainable Buildings Team.** The SBT provides an interdisciplinary approach to the formulation of plans, policies, D&S, recommendations, guidance, and training to achieve Reclamation's sustainable building requirements. The SBT supports the Executive Sponsor and RLT in implementation of this Policy, related D&S, and implementation plans. The SBT comprises regional and program representatives that bring together expertise in property management, procurement, energy management, sustainable building design, building construction, and safety. The SBT has at least one representative from each region, and from Policy and Administration, TR, MSO, and Security, Safety, and Law Enforcement. The SBT charter can be found in the Reclamation SBIP.
5. **Policy.** Reclamation shall design, construct, operate, maintain, renovate, and lease applicable buildings, in accordance with sustainable building thresholds, to meet Federal Government sustainable building requirements defined by the Guiding Principles. New construction and major renovation projects shall also obtain third-party certification from a sustainable building rating system, as required. Reclamation shall incorporate the Guiding Principles into new and existing buildings and major renovations below the sustainable building thresholds, where feasible and cost effective. When upgrading or retrofitting historic buildings, Reclamation shall preserve their historical value and comply with the standards to the greatest extent possible. Requests for exemptions to sustainable building requirements must be submitted and reviewed by Reclamation's SBT.