

**Environmental Assessment for Rule, 10 CFR 433, “Energy Efficiency Standards for the Design and Construction of New Federal Commercial and Multi-Family High-Rise Residential Buildings” and 10 CFR 435 “Energy Efficiency Standards for the Design and Construction of New Federal Low-Rise Residential Buildings”  
(DOE/EA-1991)**

## SUMMARY

The U.S. Department of Energy (DOE) has prepared this Environmental Assessment (EA) for DOE's rule, 10 CFR 433, "Energy Efficiency Standards for the Design and Construction of New Federal Commercial and Multi-Family High-Rise Residential Buildings" and 10 CFR 435, "Energy Efficiency Standards for the Design and Construction of New Federal Residential Low-Rise Residential Buildings".

Section 305(a) of the Energy Conservation and Production Act (ECPA), as revised by the Energy Policy Act of 2005 (Pub. L. 109-58) requires that DOE establish sustainable design requirements for all new Federal buildings. (42 U.S.C. 6834(a)(3)(A) Section 433(a) of the Energy Independence and Security Act of 2007 (EISA 2007; Pub. L. No. 110-140) amended section 305 of ECPA to require, among other things, DOE to identify a green certification system and level for rating Federal buildings that DOE determines to be the most likely to encourage a comprehensive and environmentally sound approach to such certification and rating. (42 U.S.C. 6834(a)(3)(D)(i)(III)). Section 433 of EISA 2007 also revised the definition of "Federal building" applicable to the regulations for Federal buildings. (42 U.S.C. 6832(6)). DOE addressed the energy efficiency requirements of Section 305 of ECPA in a separate rulemaking published on December 21, 2007 (72 FR 72565). This Environmental Assessment originally addressed the sustainable design requirements contained in the Federal building proposed rule. Since the publication of the Notice of Proposed Rulemaking (NOPR), however, DOE has modified this rule to address only the green building certification requirements. For the sake of continuity of the public review process and to maintain the integrity of the NEPA process associated with the underlying rule, DOE will retain the form of the EA, even though the scope of the rule is now limited to addressing green building certification requirements. DOE has updated the EA to reflect that narrowed scope.

Under today's rule, if an agency chooses to use a green building certification system to certify its buildings for any purpose, the chosen green building certification system must meet certain criteria established by the rule.

The rule is voluntary, is not expected to cause any adverse health effects, and thus would have no environmental justice impacts affecting low-income or minority populations. The rule would not have an adverse effect on historic or archaeological sites, and would not be affected by a terrorist act. The rule would have no significant impact on sensitive environmental resources, including wetlands/floodplains, prime agricultural lands, endangered species, and sensitive ecosystems.

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## **1 PURPOSE AND NEED FOR AGENCY ACTION**

This Environmental Assessment (EA) complies with the National Environmental Policy Act of 1969 (42 U.S.C. 4321 et seq.), the implementing regulations of the Council on Environmental Quality (40 CFR Parts 1500-1508), and DOE's regulations for implementing the National Environmental Policy Act of 1969 (NEPA) (10 CFR Part 1021).

On December 21, 2007 (72 FR 72565), the DOE issued a Final Rule establishing energy conservation standards for new Federal commercial and multi-family high rise residential buildings (10 CFR Part 433) and new Federal low-rise residential buildings (10 CFR Part 435). This environmental assessment supports a rulemaking to continue DOE's efforts to comply with ECPA by specifying green building certification standards for new buildings and major renovations to certain buildings constructed for the Federal sector.

Section 305 of the Energy Conservation and Production Act (ECPA; Pub. L. No. 94-385) established energy conservation requirements for Federal buildings. (42 U.S.C. 6834). Section 433(a) of the Energy Independence and Security Act of 2007 (EISA 2007; Pub. L. No. 110-140) amended section 305 of ECPA to require, among other things, DOE to identify a green certification system and level for rating Federal buildings that DOE determines to be the most likely to encourage a comprehensive and environmentally sound approach to such certification and rating. (42 U.S.C. 6834(a)(3)(D)(i)(III)). Section 433 of EISA 2007 also revised the definition of "Federal building" applicable to the regulations for Federal buildings. (42 U.S.C. 6832(6)).

DOE's green building certification system review must be based on the General Services Administration's (GSA) review of third-party green building certification systems and other criteria outlined in EISA 2007, including: the ability and availability of assessors and auditors to independently verify the criteria and metrics; the ability of the applicable certification organization to collect and reflect public comment; the ability of the standard to be developed and revised through a consensus-based process; an evaluation of the robustness of the criteria for a high-performance green building; and national recognition within the building industry (42 U.S.C. 6834(a)(3)(D)(iii)).

As required under EISA 2007, at least once every five years, GSA must conduct a study to evaluate third-party green building certification systems and levels, taking into consideration these same criteria. (42 U.S.C. 6834(a)(3)(D)(iv)) After completion of each study, DOE must review and update its recommended certification systems and levels, taking into account GSA's evaluation. (42 U.S.C. 6834(a)(3)(D)(i)(III)). By rule, DOE also may allow Federal agencies to develop their own internal certification processes. (42 U.S.C. 6834(a)(3)(D)(v)).

As required by Section 436(h) of EISA 2007, in 2008 GSA identified the U.S. Green Building Council's Leadership in Energy and Environmental Design (LEED)

Silver as a green building certification system and level that meets the criteria expressly identified in the statute. In the 2011 sustainable design notice of proposed rulemaking (“sustainable design NOPR”) DOE requested comment on other green building rating systems and associated levels/points that also would meet the statutory criteria. *See* 75 FR 29933, 29938-39 (May 28, 2010).

On October 25, 2013, the GSA Administrator sent his latest green building certification system evaluation to DOE.<sup>1</sup> The Administrator recommended that Federal agencies utilize the 2009 LEED or the Green Building Initiative’s Green Globes 2010 certification system. If using LEED, GSA recommended that Federal agencies obtain at least a LEED Silver rating. If using Green Globes, GSA recommended at least two Green Globes.

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<sup>1</sup>Letter from Daniel Tangherlini, GSA Administrator, to Ernest Moniz, Secretary of Energy, dated October 25, 2013.

## **2 THE PROPOSED RULE AND ALTERNATIVES**

In accordance with NEPA, this section discusses the elements of the rule itself. As originally proposed in the NOPR, the rule would have established sustainable design standards. The final rule, however, has been significantly modified, and now only identifies certain criteria that an agency must require of green building rating systems if the agency chooses to use such a system.

### **2.1 The Proposed Action - The Rule**

The final rule addresses the green building certification requirements of Section 305 of the Energy Conservation and Production Act (ECPA; Pub. L. No. 94-385). The final rule establishes standards that Federal agencies must require of green building rating systems if the agency chooses to use such a system.

### **3      AFFECTED ENVIRONMENT AND ENVIRONMENTAL IMPACTS**

The previous EA analyzed environmental impacts based on the proposed rule. As modified, the final rule is procedural in nature for NEPA purposes. As a procedural rule for NEPA purposes, there are no environmental consequences to be analyzed. (*See* 10 CFR 102; Appendix A to Subpart D, A6). However, for the sake of continuity of the public review process and to maintain the integrity of the NEPA process associated with the underlying rule, DOE has chosen to maintain the form of the EA, even though the scope of the rule is now limited to addressing green building certification requirements. DOE has updated the EA to reflect that narrowed scope.

#### **4 PERSONS/AGENCIES CONSULTED DURING THIS RULEMAKING**

In accordance with the Council on Environmental Quality (CEQ) regulations in 40 CFR 1508.9(b), a list of persons and agencies consulted during the development of this rulemaking and environmental assessment is provided below.

##### *DOE and Contractor Staff*

- U.S. DOE Federal Energy Management Program – Margo Appel, Sarah Jensen and Ami Grace-Tardy.
- Pacific Northwest National Laboratory (DOE contractor) - Mark Halverson, Robert Lucas, and Kim Fowler.



## 5 REFERENCES

10 CFR 433. 2007. U.S. Department of Energy, " Energy Efficiency Standards for the Design and Construction of New Federal Commercial and High-Rise Multi-Family Residential Buildings." U.S. Code of Federal Regulations.

10 CFR 435. 2007. U.S. Department of Energy, "Energy Efficiency Standards for New Federal Residential Buildings." U.S. Code of Federal Regulations.

40 CFR 1500-1508. July 1, 1986. Council on Environmental Quality, "Regulations for Implementing the Procedural Provisions of the National Environmental Policy Act." U.S. Code of Federal Regulations.

Energy Conservation and Production Act (ECPA). 42 U.S.C. 6834 et seq., as amended.

National Environmental Policy Act of 1969. Public Law 91-190, 42 U.S.C. 4321 et seq., as amended.