

PART 435—ENERGY EFFICIENCY STANDARDS FOR NEW FEDERAL LOW-RISE RESIDENTIAL BUILDINGS

Subpart A—Mandatory Energy Efficiency Standards for Federal Low-Rise Residential Buildings.

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AUTHORITY: 42 U.S.C. 6831–6832; 6834–6836; 42 U.S.C. 8253–54; 42 U.S.C. 7101 *et seq.*

SOURCE: 53 FR 32545, Aug. 25, 1988, unless otherwise noted.

Subpart A—Mandatory Energy Efficiency Standards for Federal Low-Rise Residential Buildings.

SOURCE: 71 FR 70283, Dec. 4, 2006.

§ 435.1 Purpose and scope.

This part establishes energy efficiency performance standard for the construction of new Federal low-rise residential buildings as required by section 305(a) of the Energy Conservation and Production Act, as amended (42 U.S.C. 6834(a)).

§ 435.2 Definitions.

For purposes of this part, the following terms, phrases and words shall be defined as follows:

Baseline building means a new Federal low-rise residential building that is otherwise identical to the proposed building but is designed to meet but not exceed the energy efficiency specifications in the *ICC International Energy Conservation Code, 2004 Supplement Edition*, January 2005 (incorporated by reference, see § 435.3).

Design for construction means the stage when the energy efficiency and sustainability details (such as insulation levels, HVAC systems, water-using systems, etc.) are either explicitly determined or implicitly included in a project cost specification.

DOE means U.S. Department of Energy.

Federal agency means any department, agency, corporation, or other entity or instrumentality of the executive branch of the Federal Government, including the United States Postal Service, the Federal National Mortgage Association, and the Federal Home Loan Mortgage Corporation.

ICC means International Code Council.

IECC means International Energy Conservation Code.

Life-cycle cost means the total cost related to energy conservation measures of owning, operating and maintaining a building over its useful life as determined in accordance with 10 CFR part 436.

Life-cycle cost-effective means that the proposed building has a lower life-cycle cost than the life-cycle costs of the baseline building, as described by 10 CFR 436.19, or has a positive estimated net savings, as described by 10 CFR 436.20, or has a savings-to-investment ratio estimated to be greater than one, as described by 10 CFR 436.21; or has an adjusted internal rate of return, as described by 10 CFR 436.22, that is estimated to be greater than the discount rate as listed in OMB Circular Number A-94 “Guidelines and Discount Rates for Benefit-Cost Analysis of Federal Programs.”

Low-rise residential building means any building three stories or less in

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height above grade that includes sleeping accommodations where the occupants are primarily permanent in nature (30 days or more).

New Federal building means any building to be constructed by, or for the use of, any Federal agency which is not legally subject to State or local building codes or similar requirements. A new building is a building constructed on a site that previously did not have a building or a complete replacement of an existing building from the foundation up.

Proposed building means the building design of a new Federal low-rise residential building proposed for construction.

[71 FR 70283, Dec. 4, 2006, as amended at 72 FR 72571, Dec. 21, 2007]

§ 435.3 Material incorporated by reference.

(a) *General.* DOE incorporates by reference the energy performance standard listed in paragraph (b) of this section into 10 CFR Part 435 subpart A. The Director of the Federal Register has approved the material listed in paragraph (b) of this section for incorporation by reference in accordance with 5 U.S.C. 552(a) and 1 CFR Part 51. Any subsequent amendment to this material by the standard-setting organization will not affect the DOE building energy performance standard unless and until DOE amends its building energy performance standards. DOE incorporates the material as it exists on the date specified in the approval and a notice of any change in the material will be published in the FEDERAL REGISTER.

(b) *List of standards incorporated by reference.* ICC *International Energy Conservation Code (IECC), 2004 Supplement Edition*, January 2005, International Code Council, ISBN 7801S04.

(c) *Availability of references.* The building energy performance standard incorporated by reference is available for inspection at:

(1) National Archives and Records Administration (NARA). For information on the availability of this material at NARA, call (202) 741-6030, or go to: http://www.archives.gov/federal_register/

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code_of_federal_regulations/ibr_locations.html

(2) U.S. Department of Energy, Forrestal Building, Room 1M-048 (Resource Room of the Federal Energy Management Program), 1000 Independence Avenue, SW., Washington, DC 20585-0121, (202) 586-9138, between 9 a.m. and 4 p.m., Monday through Friday, except Federal holidays.

(d) *Obtaining copies of standards.* The building energy performance standard incorporated by reference may be obtained from the following source: the International Code Council, 4051 West Flossmoor Road, Country Club Hills, IL 60478-5795, <http://www.iccsafe.org/e/category.html>

§ 435.4 Energy efficiency performance standard.

(a) All Federal agencies shall design new Federal low-rise residential buildings, for which design for construction began on or after January 3, 2007, to:

(1) Meet ICC *International Energy Conservation Code, 2004 Supplement Edition*, January 2005 (incorporated by reference, see § 435.3), and

(2) If life-cycle cost-effective, achieve energy consumption levels, calculated consistent with paragraph (b) of this section, that are at least 30 percent below the levels of the baseline building.

(b) Energy consumption for the purposes of calculating the 30 percent savings shall include space heating, space cooling, and domestic water heating.

(c) If a 30 percent reduction is not life-cycle cost-effective, the design of the proposed building shall be modified so as to achieve an energy consumption level at or better than the maximum level of energy efficiency that is life-cycle cost-effective, but at a minimum complies with paragraph (a) of this section.

[71 FR 70283, Dec. 4, 2006, as amended at 72 FR 72571, Dec. 21, 2007]

§ 435.5 Performance level determination.

Each Federal agency shall determine energy consumption levels for both the baseline building and proposed building by using the Simulated Performance Alternative found in section 404 of the ICC *International Energy Conservation*