



Shaping Tomorrow's  
Built Environment Today

## ASHRAE'S PERSPECTIVE ON RECENT CHANGES TO THE 179D TAX DEDUCTION

ANSI/ASHRAE/IES Standard 90.1, *Energy Standard for Buildings Except Low-Rise Residential Buildings*, has been the basis for energy-efficiency design of buildings for over 45 years. This standard is on “continuous maintenance” which means the standard is continuously reviewed for updates, with a revised standard published every three years that encompasses the addenda that are released in the interim.

We are pleased that Congress continues to recognize the importance of this standard and its role in conserving energy and providing cost savings for building owners and occupants. The most recent Standard 90.1-2019 was found to be 5% more efficient than the previous version, Standard 90.1-2016.<sup>1</sup> In comparison to Standard 90.1-2004, Standard 90.1-2016 is 34.3% more energy efficient, and Standard 90.1-2019 is 37.6% more energy efficient.<sup>2</sup> The attached chart shows how the standard has made substantial improvements over the years and on average, buildings constructed today that adhere to the standard are 50% more efficient than those constructed using the standard from 1985.

The 179D Commercial Buildings Energy-Efficiency Tax Deduction used Standard 90.1-2007 as its basis. In the Consolidated Appropriations Act of 2021, Congress made permanent this tax deduction, and updated it so that it uses the most recent Standard 90.1 which has been affirmed by the Treasury Secretary after consultation with the Energy Secretary, and which is not later than the date that is 2 years before the date that construction of such property begins.

Because Standard 90.1 has made such remarkable improvements over the years, it may be challenging for property owners to make improvements that improve energy efficiency by 50% above the most recent standard. To help address these challenges, ASHRAE would like to call your attention to its Advanced Energy Design Guides – Achieving Zero Energy series, which provide a cost-effective approach to achieve advanced levels of energy savings. Zero Energy Guides have been developed for K-12 School Buildings, Small to Medium Office Buildings, and will soon be available for multifamily residential buildings. These guides are available for free download [here](#).

We would be happy to provide any additional technical assistance to help improve the sustainability and resilience of our built environment. For more information, or to schedule a briefing, please contact [GovAffairs@ashrae.org](mailto:GovAffairs@ashrae.org).

---

<sup>1</sup> These percentages represent national weighted averages and are from Pacific Northwest National Laboratory, “Energy Savings Analysis of ANSI/ASHRAE/IES Standards 90.1-2019 Final Progress Indicator,” 02 February 2020, PNNL-SA-150731.

<sup>2</sup> Ibid.

# Improvement in ASHRAE Standard 90.1 (Year 1975-2016)

