



## About Us

New Buildings Institute (NBI) is a nonprofit organization working to improve the energy performance of commercial buildings. As a technical resource for governments, utilities, energy efficiency advocates and the building industry, NBI acts as a carrier of ideas between these groups and works collaboratively to put the best innovations for advanced buildings into action. We assess technologies, promote design approaches and help guide policies and programs that will significantly improve the energy efficiency of commercial buildings.

Through its 15-year history, NBI has become a trusted and independent resource providing guidance and project management services to energy efficiency advocates and commercial building professionals.

While NBI's long-term goal is to achieve net-zero energy buildings—those that meet all power needs through renewable resources—we recognize that net-zero buildings are not easily attainable today. The good news is that buildings with significantly better performance than current standards are possible. NBI's current efforts provide policy and program direction and promote design practices and technologies that will result in buildings that are better for people and the environment.

## NBI and Advanced Buildings

Advanced Buildings is a set of NBI-developed tools and resources that help design teams create high performance commercial buildings. Advanced Buildings guidelines include:

**New Construction Guide**, the cornerstone of Advanced Buildings, is a simplified approach to achieving predictable energy savings in new, small to medium-sized buildings without the need for modeling.

**ALG Online** is a premier resource for energy-efficient lighting design, technologies and applications representing the latest and best thinking of experts in the field.

**Daylighting Pattern Guide** is a no-cost tool that helps design teams incorporate proven daylighting strategies into commercial building projects for substantial reductions in building energy use.

**Daylighting Guide for Office Interiors** helps designers understand and consider the best use of space and finishes to maximize illumination with daylight.

**Plug Load Best Practices Guide** describes no- and low-cost measures for reducing the energy and costs associated with plug loads in office buildings.

The following utilities and public benefits administrators are currently working with NBI:



**RTU Primer** NBI produced this guide, intended for utility program planners, energy efficiency program implementers, regulators, and others who want to know how to improve RTU energy efficiency. The RTU HVAC Efficiency Primer can help you focus your efforts and access the right resources to create an effective energy efficiency program.

## Delivering Results

NBI is a results-driven organization working to find strategic points of leverage that will deliver the best outcome for improving building efficiency. Here are some highlights of our work:

**Zero Net Energy (ZNE) Research and Case Studies.** NBI is working on a number of efforts that are related to ZNE performance in commercial buildings. ZNE has unprecedented potential to transform the way buildings use energy. This ultra-efficiency goal is one that owners can define, design teams can reach for and occupants desire. ZNE buildings use no more energy over the course of the year than they produce from on-site renewable sources.

**2012 International Energy Conservation Code (IECC).** NBI, the U.S. Department of Energy and the American Institute of Architects submitted changes to update the 2012 IECC that were adopted last fall. The changes are largely based on the NBI-developed Core Performance protocol (see Advanced Buildings below for more on Core Performance) and result in buildings that are up to 30% more energy efficient than current standards require.

**Deep Savings in Existing Buildings.** As part of its continuing investigation into best practices for lowering energy use in buildings, NBI has developed a series of case studies and other information that demonstrates significant savings potential through renovation of existing buildings. Our set of 11 case studies highlight energy retrofits in existing commercial buildings that, on average, use 50% less energy than the national average. To read case studies visit [www.advancedbuildings.net/projects-case-studies](http://www.advancedbuildings.net/projects-case-studies).

**PIER Award.** NBI has completed a three-year California Public Interest Energy Research (PIER) project called the Evidence-Based Design and Operations Research Program. Under this effort, we are currently looking at what's working in high performance commercial buildings and developing a feedback loop to the design community and building owners on ways to improve efficiency of current buildings and future projects.

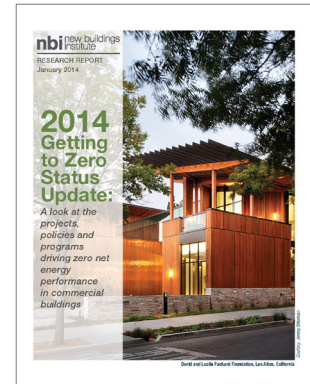
**Research on Building Energy Performance.** NBI has developed a series of research reports that examine the technologies and practices necessary to create high performance buildings. These reports also make recommendations about what's needed to move advanced practices forward.

## Learn More

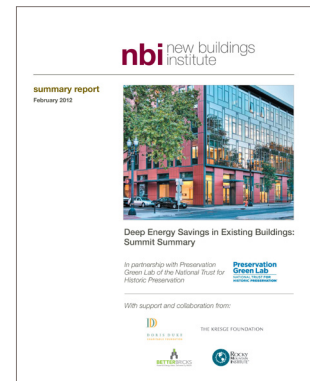


## Recent Studies

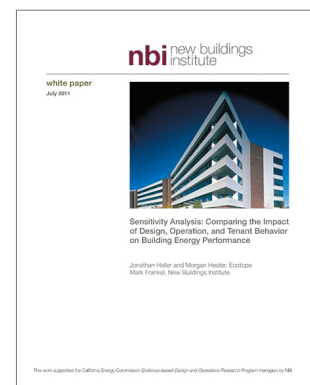
Getting to Zero 2014 Status Update, January 2014



Deep Savings in Existing Buildings Summit Summary, February 2012



Sensitivity Analysis, July 2011



For these and other NBI reports, case studies and information, visit our Resource Library at [newbuildings.org/document-library](http://newbuildings.org/document-library)