A household’s energy burden is the percentage of income spent on home energy bills. A high energy burden is considered to be above 6% and a severe energy burden above 10%. ACEEE finds that certain groups have disproportionately higher energy burdens than the median household, such as Black, Hispanic, Native American, older adults (65+), renters, and low-income multifamily building residents.

3.5x
The median energy burden of low-income households is 3.5 times higher than that of non-low-income households

2.3x
The median energy burden of low-income multifamily households is 2.3 times higher than that of multifamily households

45%
The median energy burden of Black households is 45% higher than that of non-Hispanic white households.

This map illustrates the median energy burden and median low-income energy burden regionally. For more energy burden data and policy solutions for reducing high energy burdens through energy efficiency at the national, state, and local levels, see the 2020 ACEEE Report How High Are Household Energy Burdens.

NATIONAL ENERGY BURDENS

- Median energy burden is 3.1%, and the median low-income energy burden is 8.1%.
- A quarter of low-income households have an energy burden above 14.4%, which is more than 4.5 times higher than the median energy burden.
- 25% of households (30.6 million) have a high energy burden (above 6%).
- 13% of households (15.9 million) have a severe energy burden (above 10%).

- 36% of Black households (6.0 million), 28% of Hispanic households (4.6 million), and 36% of Native American households (541,155) experience a high energy burden (above 6%).
- Based on the groups in the study, low-income households (8.1%), low-income multifamily households (5.6%), and manufactured home residents (5.3%) experienced the highest median energy burdens nationally.
LOCALLY LED STRATEGIES TO ADDRESS HIGH ENERGY BURDENS

Low-income weatherization and energy efficiency retrofits offer a long-term solution to addressing high household energy burdens. Key strategies for addressing energy insecurity include design energy efficiency and weatherization programs to meet the needs of highly burdened communities, increase overall funding, and improve program design to maximize benefits for low-income communities.

- **Set energy burden goals and track progress**
  Local and state policymakers and utilities can set energy affordability and energy burden goals as a first step to addressing energy insecurity in their communities. For example, the City of Saint Paul’s Climate Action and Resilience Plan set a goal to reduce energy burden within 10 years, so that no household spends more than 4% on its income energy bills. The city has identified a series of initiatives to alleviate the energy burden among residential households to achieve this goal, such as establishing an energy burden working group to conduct outreach, developing policy options to incentivize low-income solar development, and offering higher renewable production incentives to low-income households. The city can continue to create strategies to achieve this goal and concrete steps to track progress toward this goal.

- **Increase funding for low-income weatherization**
  Local governments can devote funds to support weatherization and energy efficiency retrofit programs funded through the local utility or federal programs, partner with local implementers on a low-income energy efficiency program, or fund and run their own innovative pilot or energy efficiency program. For example, the City of Philadelphia partners on multiple pilot programs to reduce high energy burdens. Along with the local energy utilities and other private and public-sector partners, the Philadelphia Energy Authority launched a multifamily pilot program in 2017 and plans to launch another pilot that will leverage funding to deliver energy savings and health and safety benefits in 2021. Philadelphia, as well as other cities, can continue to dedicate additional funding to support local weatherization efforts.

- **Improve program design, delivery, and evaluation through best practices and community-driven planning**
  Program designers and implementers can conduct collaborative and effective community engagement to create programs that fit the needs of the community rather than fitting the community into an already designed program. They can also incorporate best practices on program design, delivery, and evaluation, such as leveraging diverse funding sources, prioritizing deep saving measures, including quality control, and supporting local workforce development. Program implementers can also learn from and emulate successful peer program models to maximize benefits in low-income communities.

- **Integrate energy, health, and housing funding and resources**
  High energy burdens, inadequate housing, and poor health are inextricably linked. Partnerships, the pooling of resources, and establishing referral networks across sectors can stretch program budgets and make programs more accessible and streamlined for residents. For example, the City of Fort Collins administers a Healthy Homes Program to reduce exposure to in-home pollutants that are likely to trigger respiratory ailments by recommending low-cost or free solutions. Home assessments document concerns related to energy, moisture, air sealing, combustion safety, and ventilation, among other hazards, and will refer residents to relevant resources/programs.

See the full 2020 report for additional energy burden data: [www.aceee.org/energy-burden](http://www.aceee.org/energy-burden).

For additional questions on energy burden data and/or policy solutions at the national, state, or local level, please contact Ariel Drehobl at adrehobl@aceee.org.