

Georgia Champions Energy Efficiency Savings

In 1996, an international audience converged in Atlanta to participate in the Summer Olympic Games. Spectators marveled at the athletic feats as champions competed for medals, set new world records, and ignited the pride of their home countries. Georgia is proud of its local champions as well. Georgia promotes programs and policies that champion energy efficiency and self-sufficiency for low-income families. A key component in this winning strategy is Georgia's partnership with the U.S. Department of Energy (DOE) to implement the Weatherization Assistance Program (Weatherization). Weatherization reduces energy costs for low-income households by increasing the energy efficiency of their homes, while ensuring their health and safety.

WEATHERIZATION ASSISTANCE PROGRAM

Low-income households typically spend 14% of their total annual income on energy, compared with 3.5% for other residents. This burden becomes even more unmanageable when energy prices spike. Low-income families often have to cut back on other necessities to pay their energy bills. Weatherization measures provide long-term relief for low-income families and protect them from future fluctuations in energy prices and supplies.

Eva Nestor* could no longer afford her mounting energy bills, so she contacted her local agency for help. "Before weatherization, I was afraid of how I was going to make it," Eva remarked. "But weatherization saved me money on my energy bills. Now I have hope."

RAISING THE BAR

The Weatherization Program began as an emergency response to the 1970s oil crises. In the early phase, volunteers installed temporary conservation measures. Weatherization has evolved into a sophisticated program that employs advanced technologies to achieve greater energy savings. Georgia's Environmental Facilities Authority administers the state's program and a network of 22 local agencies delivers weatherization services to eligible residents in every county.

NATIONAL WEATHERIZATION PROGRAM

Homes weatherized in 1999	68,000
DOE allocations in 1999	\$135 million
Average annual energy cost savings per household	\$300
Average space heating savings	25-30%
Energy benefits returned for every \$1 invested	\$2.10
Jobs supported	7,000

GEORGIA

Homes weatherized in 1999 (with DOE \$)	847
DOE funding in 1999	\$2 million
Clients served in 1999	4,406
Elderly	31%
People with disabilities	8%
Families with children	20%

Weatherization crews use an energy audit and advanced diagnostic tools, like the blower door, to determine the most cost-effective measures for each home. Typical weatherization measures include installing insulation; repairing heating systems; and mitigating heat loss through doors, windows, and other infiltration points. Clients are also educated on the proper use and maintenance of the installed measures.

PLAYING IT SAFE

Georgia's Weatherization Program stresses the importance of client health and safety. Crews regularly install smoke alarms and carbon monoxide detectors. Often, these safety measures make a life-or-death difference for the household.

Kenneth Gates*, a disabled father of three, contacted The Ninth District Opportunity, Inc., to have his home weatherized. Several months after the weatherization work was completed, Kenneth's family complained of chronic headaches and dizziness. When the carbon monoxide detector installed by the crew began ringing, Kenneth called the agency for assistance. The weatherization crew responded immediately. They found that his heater was not venting properly and was backdrafting carbon monoxide into the house. Carbon monoxide is an odorless, colorless gas that can be deadly in large concentrations. The crew fixed the heater for proper ventilation and today, Kenneth and his family live in a safe and energy-efficient home.

WINNING RESULTS

Weatherization measures help low-income households become more self-sufficient by reducing their energy burden and improving the energy efficiency and safety of their homes. Due to substandard housing conditions, Estella Buck* was on the verge of being forced from her home. Desperate, she contacted West Central Community Action Council for help. The weatherization crew conducted a blower door test and identified widespread air leakage; wind was sweeping right through the structure. They insulated her home, replaced turbine vents, repaired and replaced broken windows, and sealed cracks in the walls. Estella now lives in an efficient, comfortable home and remains financially independent.

Reducing residential energy demand also decreases electricity generation and associated power plant emissions, a significant source of air pollution. Helping low-income families lower their energy consumption improves local air quality and reduces adverse health effects, particularly asthma. Weatherization measures also reduce annual emissions of carbon dioxide, a leading greenhouse gas, by an average of one metric ton per weatherized home.



Georgia crews use the blower door to identify and mitigate air infiltration.

In 2000, Georgia proclaimed October 30 as Weatherization Day, in recognition of the important benefits created by the program. A local agency weatherized a house as an educational demonstration. Spectators watched as the weatherization crew used a computerized energy audit and advanced technologies to improve the energy

efficiency of the house. Educational literature was also circulated to inform the public on the energy, economic, and environmental benefits that weatherization measures create. What the audience didn't see was the hope that the Weatherization Program provides for clients like Kenneth, Eva, and Estella.

WEATHERIZATION WORKS!

Weatherization produces an impressive range of benefits for low-income households and communities. Nationally, for every \$1 invested in the program, Weatherization returns \$2.10 in energy-related benefits. Weatherization measures reduce national energy consumption and curb demand for imported oil. Weatherization works for Georgia and America!

**Names have been changed to protect the privacy of the subjects.*



TO LEARN MORE ABOUT THE WEATHERIZATION ASSISTANCE PROGRAM, CONTACT:

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Visit the Weatherization Web site at: www.eren.doe.gov/buildings/weatherization_assistance
or call the Energy Efficiency and Renewable Energy Clearinghouse at: 1-800-DOE-3732

