Energy Efficiency: The Tricky Part Is Reaching Low-Income Communities

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The Benefits of Serving Low-Income Communities: On-Site Fuel Savings

- **0.8 - 154.5 TBtu/year**
- **18.4 TBtu/year**
- **0.3 TBtu/year**
- **33.4 TBtu/year**
The Benefits of Serving Low-Income Communities: Electricity Savings

47 - 8,619 GWh/year
That’s 13% to 31% savings!

5,142 GWh/year

4,974 GWh/year

47 GWh/year
The Benefits of Serving Low-Income Communities: Reduce Energy Burden

Low-income households spend 8.2% of their income on energy costs. 3x higher than medium- and high-income populations.
The Benefits of Serving Low-Income Communities: Improve Public Health

- Air sealing, insulation, and heating upgrades
- Improved general health, reductions in some asthma symptoms, fewer cases of hypertension and upper respiratory risks, and some improvements in indoor air quality contaminants
The Benefits of Serving Low-Income Communities: Improve Public Health

EPA generated a low estimate and a high estimate of monetary benefit per kilowatt-hour reduced or avoided.

- Low estimate: 3.14 – 8.08₵/kWh
- High estimate: 0.42 – 1.17₵/kWh
- EPA generated a low estimate and a high estimate of monetary benefit per kilowatt-hour reduced or avoided.
The Challenge of Serving Low-Income Communities: Financing

Energy efficiency improvements require upfront capital, which often prohibits low-income population from making those upgrades and reaping the benefits.
The Challenge of Serving Low-Income Communities: Financing

Rebates
The benefits of rebates are limited to households that can afford the high up-front cost, or those that are comfortable carrying the cost.
The Challenge of Serving Low-Income Communities: Financing

Residential PACE
Lien on the property paid back on property tax bills that is emerging but lacking uniform consumer protects

Affordability improvements
• Best Practice Guidelines for Residential PACE Financing Programs
• Home Energy Score
The Challenge of Serving Low-Income Communities: Financing

Personal loans
• Exclude borrowers based on income, credit score, and other screening tools
• New payment obligation could have potentially negative consequences

Affordability improvements
• Credit enhancements and buydowns
• Minimizing program costs
• Cash-flow positive rules
• Extended loan terms
• *Home Energy Score*
The Challenge of Serving Low-Income Communities: Financing

Pay As You Save (PAYS)

• On-bill tariff
• Does not require an individual to pay an upfront cost, take on debt, or establish a lien

1. Utilities pay for cost-effective upgrades
2. Utilities recoup their investment via a fixed tariff charge
3. Customers immediately experience savings
   *The tariff is less than the savings*
4. Once the cost of the improvements is repaid, the tariff is removed, and the customer retains all the savings
The Current State of PAYS

- PAYS programs are or have been in effect in 7 states
- No utility has reported a disconnection for nonpayment of a cost associated with PAYS
- One investor-owned utility currently offers PAYS
- Electric co-ops received funding for PAYS programs from
  - National Rural Electric Cooperative Association
  - National Rural Utilities Cooperative Finance Corporation
  - USDA Energy Efficiency and Conservation Loan Program
  - & more
What can a SEO do to support PAYS?

• Spread the word about PAYS to local utilities/counter misinformation
• Loan application technical assistance
• Implementation support/technical guidance
Thank you

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