# 2017-2018 Indiana Weatherization Billing Analysis Report

# Prepared for the Indiana Housing and Community Development Authority

March 12, 2020

by Indiana Community Action Association 1845 W. 18th Street Indianapolis IN 46202

> In partnership with Greg Dalhoff Dalhoff Associates, LLC 533 Marshall Cir Verona, WI, 53593



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This report provides an accounting of expenditures and energy impacts of the Indiana Weatherization Assistance Program for units weatherized from April 1, 2017 to March 31, 2018. The primary goal of this study is to assess the energy impacts of Indiana's Low Income Weatherization Assistance Program with the data sources available to the Indiana Community Action Association (INCAA). The primary source of Weatherization data comes from Indiana's Weatherization Assistance Program database. The energy consumption data comes from various metered utility vendors providing natural gas and/or electricity.

Indiana's Low Income Weatherization Assistance Program (IWAP) is administered by the Indiana Housing and Community Development Authority (IHCDA) and implemented by 23 weatherization providers (see Appendix B). The providers utilized a combination of in-house weatherization crews and contractors to perform retrofits in the weatherization client's dwelling. Clients receiving Weatherization began the process with an audit performed by either an Indiana Skills Verified certified Energy Auditor or a national BPI certified Energy Auditor. The auditor performed a visual inspection of the structure's insulation levels, performed a moisture assessment to identify existing moisture problems, performed blower door testing, pressure pan testing, and zone pressure diagnostics to assess the structure's air tightness and pressure boundary. The dwelling's heating appliance also went through rigorous inspection and performance testing to verify it was working safely, cleanly, and within recommended specifications. Any drafting appliances were also tested to verify they were burning cleanly and were not dangerous to the household's health. The auditor also performed an assessment of the dwelling's fresh air capabilities using the ASHRAE 62.2- 2013 standard. Mechanical repairs and replacements were performed by Indiana Skills Verified certified Mechanical Retrofit Installers. New furnaces were sized specifically to the dwelling's heat loss and were commissioned to verify the new furnace was functioning cleanly, safely, and to manufacturer's specifications. Shell retrofits (air sealing, insulation, and light carpentry repairs) were performed by Indiana Skills Verified certified Retrofit Shell Installers. When appropriate, lead safe work practices were used to minimize the installer's and household's risk of contamination. Finally, the weatherization was inspected by a national BPI certified Quality Control Inspector to verify that the work scope was completed and the work quality was acceptable.

#### Demographics and housing stock characteristics

The program weatherized 1,106 dwellings in the manner described above. A total of 2,167 people benefited, including 568 elderly, 576 disabled, and 231 under the age of six. The average size of a weatherized dwelling was 1,279 square feet.

Most weatherized dwelling units were single family site built homes (77%). Nearly all of the remaining units were mobile homes.

Most dwellings heat using natural gas as the primary heating fuel (63 percent). A little over a quarter of the dwellings used electricity as the primary heating fuel (27 percent). Nine percent used LP gas and less than one percent used fuel oil, wood, or some other fuel (see Fig. 1).

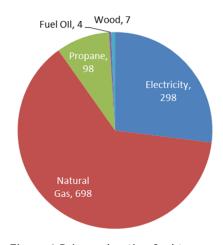


Figure 1 Primary heating fuel types

<sup>&</sup>lt;sup>1</sup> Human Services, Inc. (HIS) completed one unit during the program year. Energy usage data were not available for that job and as a result the provider is not listed in the tables and figures reporting energy impacts in later sections.

#### Funding sources and expenditures

The program spent a total of \$10.86 million, with the majority of funding from LIHEAP (63%) and DOE (34%). The remaining 3% was funded in large part by Utility programs and to a lesser degree by various State and other programs (see Figure 2).

Total expenditures averaged \$9,815. Efficiency measure expenditures averaged \$4,181, or 43% of overall expenditures.

Figure 3 provides average job costs by weatherization provider with the state average bar shown with a border. The highest average expenditures were reported for NWICA. Expenditures declined smoothly across the remaining agencies. WICCA had the lowest average expenditures.

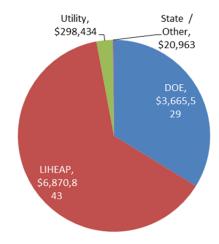


Figure 2 Funding sources and amounts

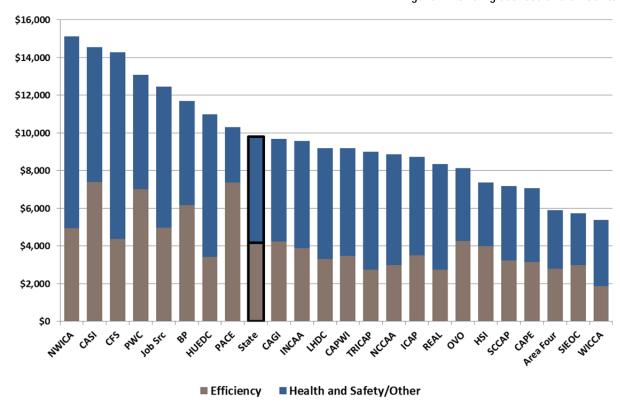


Figure 3 Average job costs by agency

Table 1 provides a breakdown of expenditures and unit size by main heating fuel. The most notable finding was that total and efficiency expenditures for units heated with natural gas were significantly higher than units using other heating fuels, even though the average unit size was nearly the same as for electrically heated units and about 5% smaller than units heated with propane and 18% smaller than those heated with any other fuel.

Table 1 Expenditures and unit size by primary heating fuel

	Number of	Avg Total	Avg Efficiency	Avg Unit
Main Heat	Units	Expenditure	Expenditure	Size (sq ft)
Electricity	298	\$8, <b>09</b> 4	\$4,104	1,252
Natural Gas	698	\$10,757	\$4,268	1,279
Propane	98	\$8,507	\$3,868	1,342
Other Fuels	12	\$8,441	\$3,554	1,5 <b>53</b>

Table 2 provides a breakdown of expenditures by housing type. The average expenditure for weatherizing the larger site-built single family houses was significantly higher than for other housing types. The Average expenditure per square foot was lower for mobile homes than for other housing types.

Table 2 Expenditures by housing type

			Avg		
	Number of	Avg Total	Efficiency	Avg Unit	Cost per Sq
Housing Type	Units	Expenditure	Expenditure	Size (sq ft)	Ft
Multi-Family	7	\$7,008	\$2,100	900	7.8
Mobile Home	244	\$7,644	\$3,334	1,077	7.1
Single Family	855	\$10,458	\$4,440	1,340	7.8

#### Net Savings Results - Natural Gas

Dwellings that heat primarily with natural gas saved an average of 245 therms (+/-34 at 90% confidence). The net savings were 29.4 percent (+/-3.1%) based on reliable results from 489 dwellings.

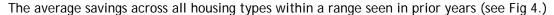
Gas savings for site-built single family homes were more than double saving for mobile homes. Savings for site built single family averaged 259 therms (+/-3.6), with 30.1% savings (+/-3.2%). Savings for mobile homes averaged 121 therms (+/-49), with 20.4% savings (+/-7.0%) (see Table 3).

The 90% confidence interval provides a range over which we are 90% certain that the true mean value lies within. For example, a value of 100 therms +/-20 suggests that the true mean value falls between 80 and 120 therms.

Table 3 Natural gas fuel consumption analysis results

	Weatherization Clients				LIHEAP Comparison Group			Net Impacts						
			Post				Pre	Post			Net			
	Number	Pre Usage	Usage	Savings	90%	Number	Usage	Usage	Savings	90%	Savings	90% conf	Percent	90%
	of Units	(therms)	(therms)	(therms)	conf	of Units	(therms)	(therms)	(therms)	conf	(therms)	(therms)	Savings	conf
All Housing Types	489	835	589	246	± 33	16,673	835	834	1	± 7	245	33.5	29.4%	± 3.1%
Single Family Site Built	438	862	602	261	± 35	14,586	863	861	1	± 7	259	36.2	30.1%	± 3.2%
Mobile Home	49	594	476	118	± 47	1,459	589	592	-3	± 10	121	48.7	20.4%	± 7.0%

The average pre-weatherization usage for the weatherization clients during this study period was 835 therms, which is comparable to 816 therms observed in the prior evaluation.



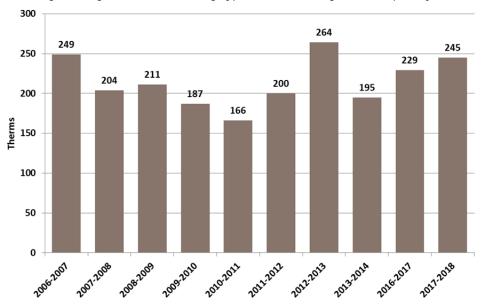


Figure 4 Historical normalized annual natural gas savings

Figure 5 shows the average net percent savings of each Weatherization provider as well as the state average percent savings. Fifty-two percent of the providers reduced natural gas consumption by 25 percent or more. Detailed results for each weatherization provider are shown in Appendix C.2.

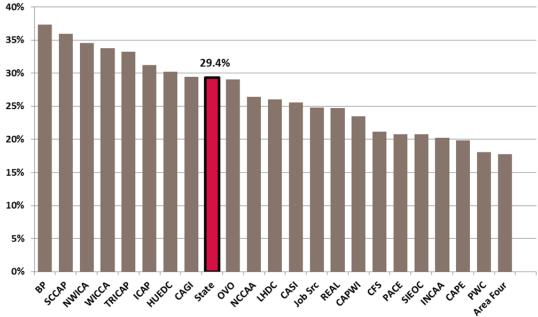


Figure 5 Percent savings by agency (natural gas)

Figure 6 presents the average savings alongside the average pre-weatherization normalized annual consumption for each weatherization provider. The average pre-weatherization usage is highly correlated with savings so that higher usage is a strong indicator of larger potential energy savings. Most providers were weatherizing dwellings typically consuming between 600 and 900 therms per year. Brightpoint (BP) targeted units averaging 1,215 therms and NWICA targeted homes averaging 997 therms prior to weatherization. These agencies also had the highest gas savings.

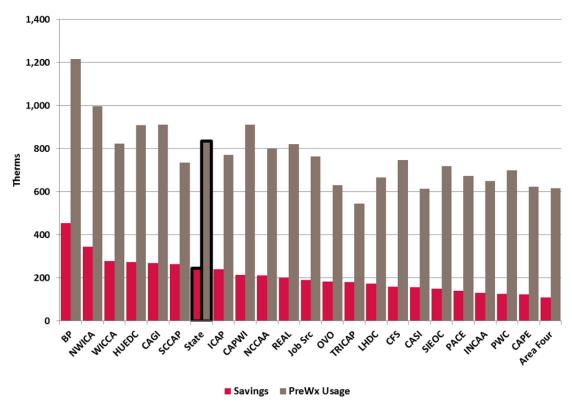


Figure 6 Normalized annual savings and pre-weatherization consumption by agency

Figure 7 provides average net savings and average job cost for natural gas heated homes with reliable weather normalization results. The figure shows the poor relationship between total expenditures and the resulting energy savings, in part due to differences in housing stock and the necessity for spending for Health and Safety measures according to DOE requirements in addition to cost-effective efficiency measures.

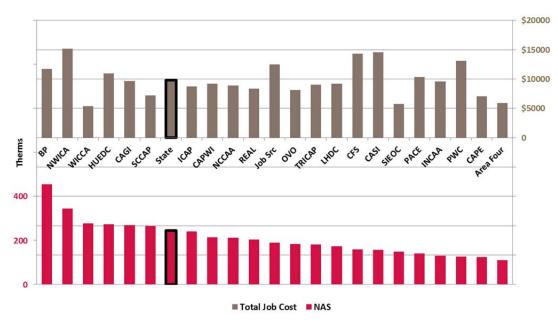


Figure 7 Normalized annual savings (NAS) and total job cost, by agency

#### **Net Savings Results - Electricity**

Electricity savings are presented for two distinct client groups: 1) those that heat with electricity as the primary heating source (denoted as 'Total Electric'), and 2) those that heat primarily with non-electric fuels (denoted as 'Local Burn' -- see sidebar).

Table 4 provides state level electricity impacts. Reliable estimates of savings were determined for 35% of 'total electric' (electrically-heated) units and for 23% of all local burn housing units. Savings for the 104 'total

"Total Electric" is used here to refer to units that heat primary with electricity. "Local Burn" is used to categorize homes that are heated with a non-electrical source of heat (natural gas, LP gas, fuel oil, wood, etc). Electricity consumption and savings vary significantly between these groups.

electric' units with reliable results averaged 2,685 kWh (+/-1,387), with percentage savings of 14.2% (+/-6.6%). Local Burn units saved 645 kWh (+/-817), with percentage savings of 7.1% (+/-8.6%) from 182 units with reliable results.

Table 4 Electricity consumption analysis results

	Weatherization Clients			LIHEAP Comparison Group			Net Impacts							
			Post				Pre	Post			Net			
	Number	Pre Usage	Usage	Savings	90%	Number	Usage	Usage	Savings	90%	Savings	90% conf	Percent	90%
	of Units	(kWh)	(kWh)	(kWh)	conf	of Units	(kWh)	(kWh)	(kWh)	conf	(kWh)	(kWh)	Savings	conf
Electric Heat Results														
All Housing Types	104	18,848	16,442	2,405	± 1,328	2,453	18,871	19,130	-259	± 339	2,685	1,387	14.2%	± 6.6%
Single Family Site Built	59	19,107	16,352	2,755	± 2,008	1,755	19,050	19,301	-251	± 448	3,029	2,086	15.9%	± 9.6%
Mobile Home	45	18,508	16,561	1,948	± 1,646	692	18,643	18,849	-206	± 500	2,171	1,737	11.7%	± 8.6%
Local Burn Electricity Re	sults													
All Housing Types	182	9,084	8,310	774	± 808	7,499	8,868	8,740	128	± 128	645	817	7.1%	± 8.6%
Single Family Site Built	154	9,010	8,202	808	± 838	6,257	8,914	8,797	117	± 138	691	848	7.7%	± 9.0%
Mobile Home	26	9,639	9,064	575	± 2,827	677	9,067	8,919	148	± 468	412	2,868	4.3%	± 29.0%

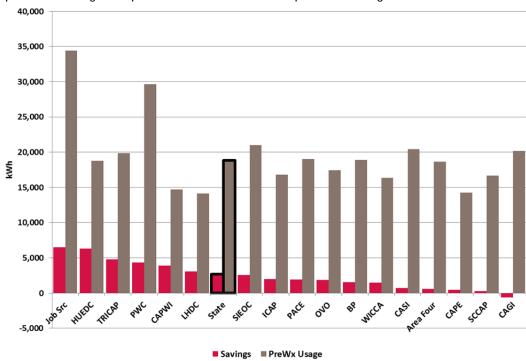


Figure 8 provides savings and pre-weatherization consumption for all agencies.

Figure 8 Electricity net savings and pre-weatherization consumption

The providers that weatherized more electrically-heated units than other fuels included Hoosier Uplands EDC (HUEDC), Ohio Valley Opportunities (OVO), South Central CAP (SCCAP), Southeastern Indiana Community Action (SIEOC), TRICAP. Detailed results for each provider are shown in Appendix C.3 (Total Electric) and C.4 (Local Burn).

#### **Client Bill Savings**

First year client bill savings were estimated at the state level using Indiana-specific fuel prices as reported by the DOE's Energy Information Agency. Gas and electrically heated units account for 90% of all weatherized units in the state. Gas heated units averaged bill savings of \$258. Electrically-heated units averaged \$276. The weighted average client bill savings for these units was \$264.

Table 5 Client fuel bill savings

	Gas	Electricity	Total
Gas Heated Units	\$192	\$66	\$258
Electrically Heated Units	-	\$276	\$276
Overall			\$264

#### Methodology Used to Assess Fuel Consumption Impacts

A standard approach was used to assess program energy impacts. Metered fuel (gas and electricity) data were collected for a period before and after measures were installed in the weatherization clients' dwellings. The energy usage in each of these periods was adjusted for long term weather conditions to provide a measure of building performance in a normal year, known as the normalized annual consumption (NAC). The difference in the NAC prior to and following measure installation is the change in usage.

The same procedure was used for a group of similar households and dwellings. These included clients of the Energy Assistance Program (EAP) that did not participate in the weatherization program over the entire period of study. A similar approach was used to assess the NAC in the same timeframes as for the treatment group. The difference in NAC provides a measure of change in energy usage that we'd have expected to have occurred in the weatherization (treatment) group in the absence of the program.

Finally, the difference between the change in usage for the weatherization group and the comparison group provides the net change in usage for the program. That value is the normalized annual savings (NAS).

The Weatherization Assistance Program (WAP) treatment group included dwellings reported as completed from April 1, 2017 through March 31, 2018 in the Indiana Weatherization Assistance Program database. Our comparison group was comprised of Energy Assistance Program (EAP) clients who applied for assistance from Oct 1, 2018 through Sept 30, 2019. EAP clients who also appeared in the WAP dataset were removed.

Unmatched or missing utility information, such as the name of the vendor or the client's account number, were found with searches of the RIAA database. Missing treatment group information, such as the date of the weatherization audit, dwelling size, or the name of the auditor, was collected by additional requests from the local weatherization provider's original job notes on file. In all there were 1,106 dwellings treated in this study period.

Consumption data was requested of 35 utility vendors of which 31 vendors responded (see Appendix A). These requests included 98% of all clients heating with gas, 91% of clients heating with electricity, and 87% of local burn electricity units.

Consumption data was cleaned for duplicate readings. Readings flagged as estimated readings were combined with the corresponding actual reading. Reliable pre- and post-weatherization models were available for 489 (70%) of clients heating with gas, 104 (35%) of clients heating with electricity, and electricity for 182 (23%) of local burn cases.

The comparison group included 16,673 cases of gas-heated units, 2,453 cases of electrically-heated units, and electricity for 7,499 local burn units.

Weatherization providers and their associated EAP providers were assigned to one of six weather stations according to proximity to those stations. The stations included Chicago, IL; Fort Wayne, IN; South Bend, IN; Indianapolis, IN; Evansville, IN; and Cincinnati, OH.

The Building Energy Analysis of Consumption software was used to perform the weather normalization modeling. Each pre- and post- period was modeled using up to eleven models depending on the dwelling characteristics and the length of the usage history (more complex models and those assessing cooling as well as heating require longer usage histories). Models using fixed and floating reference temperatures were assessed. The model with highest reliability was selected and used to model the dwellings energy consumption in a typical year. The process is performed for the pre- and post-treatment periods for each dwelling in the treatment and comparison groups. The comparison group results are matched to the weatherization groups based by provider, housing type, and heating fuel prior to assessing the net impacts.

#### **Appendix A - Participating Utilities**

American Electric Power

**Anderson City Utilities** 

**Bluffton Utilities** 

**Boonville Natural Gas** 

Citizens Energy

City of Covington

**Community Natural Gas** 

Crawfordsville Utilities

**Daviess Martin REMC** 

**Dubois REC** 

Duke

Harrison County REMC

**Huntingburg Municipal Utilities** 

Indiana Natural Gas

Indianapolis Power & Light

Jasper Municipal Utilities

Midwest Natural Gas

**NIPSCO** 

Noble REMC

Ohio Valley Gas

Southeastern REMC

Southern Indiana Power

Switzerland Co Gas

Sycamore Gas

Tell City Electric

Tipmont REMC

**UDWI REMC** 

Vectren

Washington Municipal Utilities

Whitewater Valley REMC

Win Energy

## **Appendix B - Weatherization Providers**

Abbrev	Weatherization_Provider	Completions
Area Four	Area IV Agency	73
CANI	Brightpoint (CANI)	90
CAGI	Community Action of Greater Indianapolis, Inc	87
CFS	Community & Family Services, Inc.	51
CAPE	Community Action Program of Evansville	50
CAPWI	Community Action Program, Inc. of Western Indiana	27
CASI	Community Action of Southern Indiana	38
TRICAP	Dubois-Pike-Warrick Economic Opportunity Committee, Inc., d/b/a	
IRICAP	TRI-CAP	31
HUEDC	Hoosier Uplands E. D. C.	46
HSI	Human Services, Inc.	1
ICAP	Interlocal Community Action Program	69
INCAA	Indiana Community Action Association	11
Job Src	JobSource	48
LHDC	Lincoln Hills Development Corporation	29
NWICA	NWI Community Action Corporation	72
NCCAA	North Central Community Action Agencies, Inc.	62
OVO	Ohio Valley Opportunities, Inc.	54
PACE	Pace Community Action Agency, Inc.	43
PWC	People Working Cooperatively, Inc	38
REAL	REAL Services EAP	50
SIEOC	Southeastern Indiana Community Action	47
SCCAP	South Central Community Action Program	54
WICCA	Western Indiana Community Action Agency Inc	35

### **Appendix C - Detailed Energy Impact Results**

Table C.1 Impacts by Housing Type

		We	eatheriza	ition Clie	nts			LIHEA	AP Compa	rison Gr	Net Impacts					
	Number	of Units					Number	of Units								
			Pre	Post		90%			Pre	Post		90%	Net	90%	Percent	90%
	Clients	Sample	Usage	Usage	Savings	conf	Clients	Sample	Usage	Usage	Savings	conf	Savings	conf	Savings	conf
Natural Gas Results	_		(therms)	(therms)	(therms)	(therms)			(therms)	(therms)	(therms)		(therms)	(therms)		
All Housing Types	698	489	835	589	246	± 33	57,882	16,673	835	834	1	± 7	245	33	29.4%	± 3.1%
Single Family Site Built	609	438	862	602	261	± 35	36,759	14,586	863	861	1	± 7	259	36	30.1%	± 3.2%
Mobile Home	84	49	594	476	118	± 47	3,870	1,459	589	592	-3	± 10	121	49	20.4%	± 7.0%
	•	•														
Electric Heat Results	_		(kwh)	(kwh)	(kwh)	(kwh)			(kwh)	(kwh)	(kwh)	(kwh)	(kwh)	(kwh)		
All Housing Types	298	104	18,848	16,442	2,405	± 1,328	42,485	2,453	18,871	19,130	-259	± 339	2,685	1,387	14.2%	± 6.6%
Single Family Site Built	179	59	19,107	16,352	2,755	± 2,008	10,922	1,755	19,050	19,301	-251	± 448	3,029	2,086	15.9%	± 9.6%
Mobile Home	117	45	18,508	16,561	1,948	± 1,646	4,315	692	18,643	18,849	-206	± 500	2,171	1,737	11.7%	± 8.6%
	•		!			'		,					!			
Electricity Impacts in																
Non-Electrically Heated																
Units			(kwh)	(kwh)	(kwh)	(kwh)			(kwh)	(kwh)	(kwh)	(kwh)	(kwh)	(kwh)		
All Housing Types	807	182	9,084	8,310	774	± 808	65,817	7,499	8,868	8,740	128	± 128	645	817	7.1%	± 8.6%
Single Family Site Built	675	154	9,010	8,202	808	± 838	40,985	6,257	8,914	8,797	117	± 138	691	848	7.7%	± 9.0%
Mobile Home	127	26	9,639	9,064	575	± 2,827	5,801	677	9,067	8,919	148	± 468	412	2,868	4.3%	± 29.0%

Table C.2 Gas Impacts by Agency

	Weatherization Clients							LIHE	AP Compa	rison Grou	Net Impacts					
	Number of Units		I			Number	of Units	I								
			Pre	Post		90%			Pre	Post	1	90%	Net	90%	Percent	90%
Agency	Clients	Sample	Usage	Usage	Savings	conf	LIHEAP	Sample	Usage	Usage	Savings	conf	Savings	conf	Savings	conf
All Housing Types			(therms)	(therms)	(therms)	(therms)			(therms)	(therms)	(therms)	(therms)	(therms)	(therms)		
NWI Community Action Corporation	70	60	997	645	351	± 109	6,876	2,685	958	956	2	± 15	345	± 111	34.6%	± 8.2%
REAL Services EAP	49	38	820	613	207	± 117	6,133	2,108	824	820	4	± 17	203	± 120	24.8%	± 12.0%
Area IV Agency	51	39	617	514	103	± 80	2,020	417	619	626	-7	± 27	110	± 86	17.8%	± 12.0%
Community Action of Greater Indianapolis, Inc	72	45	912	638	273	± 106	10,362	13,807	987	973	14	± 10	269	± 106	29.5%	± 9.4%
Brightpoint (CANI)	66	55	1,216	737	478	± 108	5,171	1,597	1,191	1,171	20	± 22	454	± 110	37.4%	± 6.6%
Community Action Program of Evansville	41	25	625	482	143	± 106	2,515	769	617	599	19	± 20	124	± 107	19.8%	± 15.2%
Community & Family Services, Inc.	28	20	747	612	135	± 98	961	76	728	750	-23	± 57	158	± 117	21.2%	± 13.1%
Community Action Program, Inc. of Western Indiana	16	9	910	702	209	± 301	583	191	922	927	-5	± 70	214	± 312	23.5%	± 28.0%
Interlocal Community Action Program	41	32	770	525	244	± 101	2,828	1,035	775	771	4	± 21	240	± 103	31.2%	± 10.5%
JobSource	36	27	764	581	183	± 120	3,741	876	756	762	-7	± 23	189	± 123	24.8%	± 13.3%
Hoosier Uplands E. D. C.	12	5	908	619	289	± 497	745	111	908	893	16	± 93	274	± 502	30.2%	± 45.1%
Lincoln Hills Development Corporation	12	6	666	486	179	± 122	454	14	666	660	6	± 91	173	± 157	26.0%	± 18.3%
North Central Community Action Agencies, Inc.	55	44	803	602	200	± 73	3,439	1,650	802	813	-12	± 14	212	± 75	26.4%	± 7.5%
Ohio Valley Opportunities, Inc.	14	9	631	399	232	± 108	1,091	41	634	586	48	± 53	183	± 118	29.1%	± 15.4%
South Central Community Action Program	14	9	734	460	274	± 372	910	188	553	555	-3	± 29	264	± 374	36.0%	± 34.6%
Southeastern Indiana Community Action	15	3	720	634	86	± 111	381	2	679	837	-158	± 311	149	± 291	20.8%	± 30.5%
Dubois-Pike-Warrick Economic Opportunity Commit	12	6	545	346	199	± 108	386	32	527	510	17	± 53	181	± 123	33.2%	± 18.2%
Western Indiana Community Action Agency Inc	21	13	824	537	287	± 225	1,442	357	822	814	9	± 44	278	± 230	33.8%	± 21.7%
Pace Community Action Agency, Inc.	21	12	673	460	214	± 166	938	261	676	602	74	± 33	140	± 160	20.8%	± 21.0%
Community Action of Southern Indiana	17	10	614	460	154	± 175	1,446	226	602	605	-3	± 40	157	± 184	25.5%	± 23.0%
People Working Cooperatively, Inc	24	12	700	573	126	± 224	942	130	695	695	0	± 65	126	± 235	18.1%	± 30.4%
Indiana Community Action Association	10	10	649	528	121	± 134	549	11	499	512	-13	± 60	131	± 157	20.2%	± 20.8%

Note: We had few comparison group cases for Community Action of Greater Indianapolis. Consequently we used a sample representing the state overall.

Table C.3 Electric Heat Impacts by Agency

		W	eatheriza	tion Clien	ts			LIHE	AP Compa	rison Grou	Net Impacts					
	Number	of Units				Number of Units										
			Pre	Post		90%			Pre	Post		90%	Net	90%	Percent	90%
Agency	Clients	Sample	Usage	Usage	Savings	conf	Clients	Sample	Usage	Usage	Savings	conf	Savings	conf	Savings	conf
All Housing Types			(kWh)	(kWh)	(kWh)	(kWh)			(kWh)	(kWh)	(kWh)	(kWh)	(kWh)	(kWh)		
Area IV Agency	11	5	18,624	19,337	-713	± 8,571	1,583	46	16,228	17,310	-1,082	± 3,069	557	± 9,899	3.0%	± 48.8%
Community Action of Greater Indianapolis, Inc	13	2	20,166	20,963	-797	± 29,727	7,190	1,221	26,292	25,798	494	± 743	-655	± 30,033	-3.2%	± 148.1%
Brightpoint (CANI)	23	9	18,916	15,464	3,452	± 2,619	3,249	18	19,326	17,353	1,973	± 2,250	1,542	± 3,312	8.2%	± 18.1%
Community Action Program of Evansville	9	3	14,287	13,529	758	± 5,048	1,377	68	13,419	13,078	341	± 1,343	450	± 5,380	3.2%	± 37.3%
Community Action Program, Inc. of Western Indian	5	3	14,691	11,830	2,860	± 10,912	759	35	14,351	15,468	-1,117	± 2,133	3,918	± 12,239	26.7%	± 58.5%
Interlocal Community Action Program	20	8	16,826	15,099	1,727	± 4,966	1,723	256	18,011	18,310	-298	± 937	2,005	± 5,124	11.9%	± 27.7%
JobSource	12	2	34,410	27,346	7,064	± 45,038	2,261	107	34,403	33,782	620	± 3,344	6,483	± 45,151	18.8%	± 115.8%
Hoosier Uplands E. D. C.	29	10	18,771	12,339	6,431	± 4,388	1,833	226	17,076	16,900	175	± 1,240	6,300	± 4,649	33.6%	± 17.4%
Lincoln Hills Development Corporation	7	1	14,119	10,713	3,406	-	559	16	12,091	11,807	283	± 1,431	3,075	±	21.8%	± 0.0%
Ohio Valley Opportunities, Inc.	35	11	17,464	16,228	1,236	± 3,806	2,696	213	18,887	19,537	-650	± 848	1,841	± 3,955	10.5%	± 20.9%
South Central Community Action Program	25	7	16,645	16,558	88	± 2,223	1,713	128	16,911	17,115	-204	± 924	298	± 2,476	1.8%	± 14.5%
Southeastern Indiana Community Action	24	15	21,016	18,466	2,551	± 3,302	1,087	62	20,296	20,402	-106	± 1,465	2,553	± 3,675	12.1%	± 16.0%
Dubois-Pike-Warrick Economic Opportunity Comm	14	6	19,838	14,659	5,179	± 6,751	700	58	19,910	19,434	476	± 2,244	4,771	± 7,222	24.0%	± 29.8%
Western Indiana Community Action Agency Inc	13	5	16,354	15,710	644	± 7,880	1,576	190	16,276	17,111	-835	± 870	1,483	± 8,089	9.1%	± 45.5%
Pace Community Action Agency, Inc.	19	12	19,029	17,110	1,919	± 3,758	1,378	86	19,243	19,230	13	± 1,539	1,943	± 4,110	10.2%	± 20.1%
Community Action of Southern Indiana	15	4	20,401	19,987	414	± 9,903	1,538	130	19,704	19,971	-267	± 1,421	701	± 10,223	3.4%	± 47.8%
People Working Cooperatively, Inc	7	1	29,662	23,375	6,287	-	1,016	7	28,411	26,516	1,894	± 3,912	4,310	±	14.5%	± 0.0%

Table C.4 Electric Local Burn Impacts by Agency

	Weatherization Clients							LIHEAP Comparison Group							Net Impacts				
Num		Number of Units					Number	of Units											
			Pre	Post		90%			Pre	Post		90%	Net	90%	Percent	90%			
Agency	Clients	Sample	Usage	Usage	Savings	conf	Pop	Sample	Usage	Usage	Savings	conf	Savings	conf	Savings	conf			
All Housing Types			(kWh)	(kWh)	(kWh)	(kWh)			(kWh)	(kWh)	(kWh)	(kWh)	(kWh)	(kWh)					
NWI Community Action Corporation	71	33	8,378	6,931	1,447	± 1,374	6,892	1,505	7,719	7,482	237	± 204	1,201	± 1,375	14.3%	± 15.4%			
REAL SERVICES EAP	49	8	7,673	7,062	611	± 2,849	6,264	1,130	7,031	7,068	-37	± 234	655	± 2,879	8.5%	± 35.4%			
Area IV Agency	62	31	9,006	8,718	288	± 2,158	2,308	260	8,694	8,727	-33	± 656	309	± 2,288	3.4%	± 24.3%			
Brightpoint (CANI)	67	8	9,735	8,576	1,159	± 3,699	5,380	43	10,332	10,276	56	± 1,598	1,136	± 4,066	11.7%	± 39.0%			
Community Action Program of Evansville	41	10	9,036	9,153	-117	± 2,426	2,524	559	8,152	8,430	-278	± 313	191	± 2,495	2.1%	± 26.4%			
Community & Family Services, Inc.	35	4	9,998	7,600	2,399	± 4,948	1,176	96	8,771	8,793	-22	± 772	2,423	± 5,088	24.2%	± 42.9%			
Community Action Program, Inc. of Western Indiana	22	3	12,878	11,593	1,285	± 13,478	813	62	11,980	11,234	746	± 1,372	441	± 13,440	3.4%	± 106.9%			
INTERLOCAL COMMUNITY ACTION PROGRAM	49	8	10,866	10,039	828	± 3,765	3,048	461	12,369	11,787	582	± 558	316	± 3,726	2.9%	± 34.8%			
JobSource	36	2	4,596	6,588	-1,992	± 5,737	3,818	204	6,649	6,682	-33	± 544	-1,938	± 5,803	-42.2%	± 138.3%			
Hoosier Uplands E. D. C.	17	8	9,800	9,135	664	± 5,264	1,217	216	8,656	8,622	35	± 766	618	± 5,373	6.3%	± 52.3%			
Lincoln Hills Development Corporation	22	4	11,269	9,466	1,803	± 8,668	677	27	10,997	10,884	113	± 2,025	1,633	± 9,186	14.5%	± 70.1%			
North Central Community Action Agencies, Inc.	62	15	8,741	6,971	1,770	± 4,252	3,637	994	8,053	7,783	269	± 498	1,483	± 4,262	17.0%	± 42.1%			
Ohio Valley Opportunities, Inc.	19	3	7,982	9,743	-1,761	± 5,017	1,380	14	8,937	8,241	696	± 1,642	-2,383	± 5,282	-29.8%	± 79.9%			
South Central Community Action Program	29	3	8,308	7,822	485	± 11,539	1,389	76	7,416	7,454	-39	± 978	512	± 11,720	6.2%	± 134.9%			
SIEOC	23	6	7,615	8,671	-1,055	± 7,687	728	31	8,857	8,749	108	± 2,292	-1,183	± 8,118	-15.5%	± 107.9%			
Dubois-Pike-Warrick Economic Opportunity Commit	17	5	7,432	6,443	989	± 3,751	503	50	6,979	7,137	-158	± 1,071	1,162	± 4,075	15.6%	± 47.4%			
WESTERN INDIANA COMMUNITY ACTION AGENCY IN	22	10	9,370	8,704	667	± 3,486	1,841	266	11,141	11,219	-77	± 692	722	± 3,568	7.7%	± 35.9%			
Pace Community Action Agency, Inc.	24	6	13,550	12,154	1,396	± 5,217	2,219	118	12,889	13,279	-390	± 1,062	1,781	± 5,427	13.1%	± 37.2%			
Community Action of Southern Indiana	23	3	5,577	5,273	305	± 526	1,658	54	9,270	9,232	38	± 992	282	± 990	5.1%	± 17.0%			
People Working Cooperatively, Inc	31	4	10,929	10,829	99	± 10,851	1,187	69	11,571	11,242	329	± 1,685	-238	± 11,030	-2.2%	± 101.2%			
Indiana Community Action Association	11	8	8,945	8,330	615	± 5,351	607	7,427	8,062	7,951	111	± 134	475	± 5,354	5.3%	± 57.4%			