
**HOME ENERGY ASSISTANCE REVIEW AND
REFORM{PRIVATE }**

IN COLORADO

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HOME ENERGY ASSISTANCE REVIEW AND REFORM IN COLORADO

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DEFINITIONS

Annual Utility Costs: Annual utility costs are average monthly utility bills multiplied by 12. Within this definition, therefore, is incorporated the decision that "utility costs" involve three components: heating, cooling, and miscellaneous appliances. In addition, this definition incorporates bulk fuel costs as well as natural gas and electric costs as a "utility" cost.

Cooling Degree Days (CDDs): A measure of how hot a location is over a period of time, relative to some base temperature. A commonly used base temperature is 65 degrees Fahrenheit. The Cooling Degree Days for a single day is the difference between the base temperature and the average temperature for the day. The average daily temperature is the mean of the minimum and maximum daily temperature. CDDs are determined by subtracting 65 from the average daily temperature. For example, a day with an average temperature of 85 degrees Fahrenheit has 20 Cooling Degree Days. If the average temperature is equal to or less than 65 degrees, there are zero Cooling Degree Days.

Cost-effective: Cost-effectiveness has several crucial components to it. First, determining cost-effectiveness implies a performance evaluation. A fuel assistance strategy, in other words, is not merely "cost-effective" but must instead be cost-effective in *doing* something. Hence, the same measure may be "cost-effective" for one purpose but not for another. Second, "cost-effective" implies a comparison to something. The cost-effectiveness of a strategy, in other words, is to be measured relative to something. Third, as a necessary coincident, cost-effectiveness implies the existence of alternatives. Rarely, if ever, is the "do nothing" alternative an available option in the arena of addressing unaffordable home energy. *Something* almost always happens. The issue before decisionmakers is what that "something" should be. Fourth, cost-effective implies a perspective. Different results can be perceived differently depending upon perspective. The definition of what represents a "cost" and what represents a "benefit" often depends on the perspective of the person advancing the definition. In addition, the extent to which, if at all, certain "costs" and "benefits" should be

included in the calculus depends on the perspective of the party. Finally, cost-effective is specific to a particular delivery mechanism. That which might be cost-effective for the government to perform may not be cost-effective if performed by private industry (and *vice versa*). Accordingly, bringing all five tests together, "cost-effective" does *not* necessarily imply engaging in actions that return more benefits than costs expended. Instead, cost-effective means that an action maximizes net accomplishment of an agreed upon result *vis a vis* available alternatives. "Net accomplishment" is a measure of "efficiency."

Efficient: Efficiency is to be measured by "net accomplishment." Net accomplishment means an action which maximizes an agreed upon result must be discounted by the cost of achieving that result. An "efficient" strategy is one which maximizes net accomplishment. "Net accomplishment" can be illustrated in the utility credit and collection arena through the use of the term "net back." "Net back" is calculated by taking the dollars collected through a particular tactic and subtracting the dollars expended on the process of collection. The most "efficient" collection process is, therefore, the process which maximizes "net back."

Eligible: Households eligible for energy assistance are defined to be persons who are "low-income" and who have an energy need as defined in this report.

Energy Efficiency/Energy Efficiency Program: Energy efficiency programs are initiatives designed to reduce the use of energy necessary to accomplish any given task. Thus, for example, a well-insulated home can be heated to the same degree as a poorly insulated home while using less energy. An energy efficient refrigerator can keep food as cold as a non-energy efficient refrigerator while using less energy. An energy efficiency light provides the same illumination while using less energy. Energy efficiency programs recognize that utility customers, in fact, do not wish to purchase electricity or natural gas. They rather wish to purchase the end results which the energy provides: a warm home, cold food, hot water. Energy efficiency thus seeks to provide the same level of results (or more) while using less energy.

Heating Degree Days (HDDs): A measure of how cold a location is over a period of time, relative to some base temperature. A commonly used base temperature is 65 degrees Fahrenheit. The Heating Degree Days for a single day is the difference between the base temperature and the average temperature for the day. The average daily temperature is the mean of the minimum and maximum daily temperature. HDDs are determined by subtracting the average daily temperature from the base temperature. For example, a day with an average temperature of 50 degrees Fahrenheit has 15 Heating Degree Days. If the average temperature is equal to or more than 65 degrees, there are zero Heating Degree Days.

Home Energy Needs: The definition of home energy needs for purposes of this report is limited to cash fuel assistance (and thus excludes weatherization and other energy efficiency improvements). "Home energy needs" is not simply a function of income; nor is it simply a

function of energy bills. It is instead a function of home energy bills in relation to income: the "energy burden." Low-income "home energy needs" involve the amount by which low-income energy burdens exceed the average home energy burden of the total population. By this definition, one specific *exclusion* is intended: home energy needs are *not* to be measured by payment-troubles (such as shutoffs or arrears). A low-income household may have a "home energy need" even if not facing the termination of service for nonpayment and even if not in arrears.

Low-Income Households: Low-income households can reasonably be defined in relation to three different variables: (1) income only; (2) income in relation to household size (*i.e.*, federal Poverty Level); and (3) income in relation to area incomes (*i.e.*, HUD Adjusted Median Family Income). The choice of where to set the threshold for who is to be considered "poor" involves political, equity and budget considerations. There is, in other words, no objective definition of "low-income." The term only has meaning within the context of the question: "this household is considered low-income *for what purpose?*"

Major Existing Programs: The major existing fuel assistance programs in Colorado involve: LIHEAP, public and assisted housing, the Property Tax Credit (PTC) program, AFDC, FEMA, and Title IV-A emergency assistance. While General Assistance is sometimes available, it is not considered a "major" program. Private funding, exclusive of CEAF, does not currently represent a "major" source of funding for fuel assistance in Colorado.

Monthly Utility Bills: Monthly utility bills include three components: home heating, cooling, and miscellaneous electric usage (*e.g.*, for appliances such as refrigerators). "Utility" bills include bulk fuel used for home heating (particularly propane in Colorado) in addition to electricity and piped natural gas.

Needs of the Low-Income Population: This definition assumes that "needs" refers to the "need for energy assistance" rather than the "need for units of energy." Within this constrain, the energy needs of the low-income population are to be determined by looking at energy bills as a percentage of income. This measure is known as "energy burden." The energy needs of low-income Colorado residents is an amount equal to the funds necessary to reduce the low-income energy burden to the average energy burden as a percentage of income of the total population.

Private Funds: Private funds referred to in this report mean funds that have their source in some agency, institution or person other than a federal, state or local government.

Public Funds: Public funds referred to in this report mean funds that have a source in federal, state or local governments. "Public funds" can be distributed by private agencies, such as Metro CareRing's distribution of FEMA funds.

Public/Private Partnerships: Public/private partnerships involve joint or coordinated efforts which recognize the substantial benefits that flow to the private partner as a result of fuel assistance. Each party to the bargain --this includes the low-income household, the government, the community, and the energy vendor-- should contribute in some fashion to resolving the inability-to-pay problem. A "partnership" need not be dual participation in a program, but may instead involve the action of one partner which *enables* the action of the other partner (*e.g.*, a Neighborhood Assistance Act tax credit program).

Space Heating: Space heating refers to the process of heating the air temperature in one's home through units designed for such purposes. It is to be contrasted, for example, to water heating.

Target Clientele: Households to be targeted for fuel assistance are those who have the highest energy needs as defined in this report. Thus, in other words, neither income alone nor home energy bills alone should serve as a mechanism for targeting. Neither should payment-troubles serve as the mechanism for targeting fuel assistance. Instead, the purpose of targeting should be to minimize low-income energy needs as defined in this report.

Tariff: A utility's tariffs are formal written documents filed with, and approved by, the state utility commission setting forth the terms and conditions of offering different classes of service. These terms and conditions include the per unit price of the service offered.

Utility: For purposes of this report, a utility is intended to refer to any company providing electricity or piped natural gas service for residential consumption. For this report, whether or not a company is a utility does not depend on whether or not it is regulated by the Colorado Public Utilities Commission.

ACRONYMS

LIHEAP: The Low Income Home Energy Assistance Program, a federally funded low-income fuel assistance program created pursuant to 42 *U.S.C.* §§2601 *et seq.*.

LEAP: The Low-income Energy Assistance Program, the term used in Colorado to refer to LIHEAP.

EXECUTIVE SUMMARY

INTRODUCTION

Colorado's utility assistance needs today are addressed and/or funded by a patchwork quilt of agencies and programs including churches, non-profit community service agencies, and a variety of other public and private agencies. The largest of these organizations is LIHEAP, the federal fuel assistance program which assists thousands of low-income Colorado residents with their heating bills every year.¹ Until recently, LIHEAP operated during Colorado's six coldest months (November through April). Because of deep federal funding cutbacks, however, the program now operates only through February.

The need for energy assistance continues to grow in Colorado. The 1990 Census reported roughly 250,000 households living at or below 150 percent of Poverty in the state, a growth of more than xxx percent since the 1980 Census. In addition, these households are, on average, living at lower levels of Poverty. In 1980, the average person living at or below 100 percent of Poverty lived, in fact, at xxx percent of Poverty. By 1990, that level had decreased to only 56 percent of Poverty.

At the same time that households are losing ground on the income side, they are losing ground on the expense side as well. While Colorado AFDC benefits increased 22.8 percent from 1985 through 1990, Colorado energy prices increased 31.4 percent. Even more worrisome is the difference in price increases. While aggregate energy prices increased 31.4 percent, electric prices increased 41 percent and natural gas prices increased 37 percent.

Despite this growth in need, in the last three years, federal funds for LIHEAP in Colorado has been cut by almost 40 percent, from approximately \$33 million in FY 1984 to only \$21

1. This program is known to some as LIHEAP, the Low-Income Home Energy Assistance Program.

million in FY 1995. Moreover, there is an anticipated additional 40 percent cut for Fiscal Year 1996. It is, as a result, imperative that current and new assistance avenues be investigated in an attempt to address the energy assistance needs of low-income Colorado residents in the future.

In light of these observations, the goal of this project is to increase the efficiency and effectiveness of efforts to address the needs of low-income households in Colorado in meeting the annual cost of their home energy needs (including electric, propane, natural gas, coal and wood). The project is to examine how assistance can be most effectively provided through public/private partnerships. One purpose of the project is to increase the effort directed toward low-income fuel assistance by developing new initiatives. The project objective is to design a more efficient and effective utility assistance program which would result in:

- o low program administrative costs;
- o delivery of assistance to low-income households as needed;
- o annual or year-round assistance; and
- o assistance provided through public/private partnerships.

In pursuit of this goal, the report below undertakes to accomplish five tasks, including:

- o To provide an overview of poverty in Colorado and of the low-income population;
- o To assess the energy needs of that low-income population in Colorado;²
- o To review the major existing public and private sources of energy assistance *currently* available in Colorado;
- o To review ongoing innovations in the delivery of fuel assistance in other states in an effort to assess potential *future* means of delivering energy assistance; and
- o To develop and recommend sources of revenue to underwrite the costs of the proposed programs.

Recommendations regarding proposed programs and sources of revenue will, however, be

2. This will be limited to financial needs. For the reasons outlined in the text of the report below, it explicitly excludes weatherization needs.

brief in this report. This report is to be considered a tool for a Task Force on Low-Income Energy Assistance to be convened by the Governor.

POVERTY IN COLORADO

Answering very simple questions about poverty in Colorado is actually quite a complex task. And, unfortunately, having appropriate answers is crucial to the design and funding of energy assistance in the state. Questions such as "how many poor people are there?" and "where do they live" involve more than developing a single number.

Implicit in any determination of how many poor households live in Colorado is the subsidiary determination of what constitutes "being poor." There are three approaches commonly used to measure "being poor" in America:

- o The first looks simply at income. Households with annual incomes of at or below \$15,000 are often considered to be "poor."
- o A second looks at income in relation to household size, the Poverty Level. This measure recognizes, in other words, that a three person household with an annual income of \$6,000 is, in fact, "poorer" than a two person household with an annual income of \$6,000. The federal government establishes a uniform "poverty level" for the 48 contiguous states. Since 100 percent of Poverty Level is generally considered to be too low to be reasonable, however, other estimates of the limits of "being poor" range from 150 to 200 percent of Poverty. Even different federal assistance programs have eligibility guidelines tied to different levels of Poverty.
- o A third indicator of low-income status is tied to local median incomes rather than to a national average. This local measure takes into account local conditions (including the cost-of-living implicit within area incomes) rather than looking only at the national average used in the Poverty Level. A two person household with an annual income of \$6,000 living in Colorado, for example, may be "poorer" than a two person household with an annual income of \$6,000 in North Dakota. While these households would be at the same Poverty Level, however, assuming that incomes track cost-of-living to some extent, they would be at different levels of local median income.

Given these different definitions of "being poor," the question "how many poor people are there" depends for its answer on what standard you are using. The differences in numbers of "poor" households can be dramatic. Consider, for example, that:

- o Colorado has almost 300,000 households with incomes at or below \$15,000 per year.

- o In contrast, roughly 253,000 households live at or below 150 percent of the federal Poverty Level. Since there is no general agreement that 150 percent of Poverty appropriately defines poor, one should remember, however, that the choice of what percentage of Poverty Level is to be considered "low-income" will make a difference of hundreds of thousands of households in Colorado. There are, in other words, "only" 150,000 households in the state who live at or below 100 percent of the federal Poverty Level, while there are roughly 370,000 households who live at or below 200 percent of Poverty. The choice of what percentage of Poverty reflects "being poor" can, in other words, affect the count of "poor people" by 220,000 households (370,000 - 150,000 = 220,000) in Colorado alone.
- o Finally, using the local measure of median income will yield even a different count of the number of poor people in Colorado. The U.S. Department of Housing and Urban Development (HUD) prepares and updates on an annual basis both a "Low Income" and a "Very Low Income" eligibility standard for use in conjunction with the projects it sponsors. The "very low-income standard" refers to all households in a county who live at or below 50 percent of the county's median income. The "low-income standard" refers to all households who live above 50 percent of the county median income, but at or below 80 percent. There are roughly 290,000 households who live at or below 50 percent of median income and roughly 520,000 who live at or below 80 percent of median income.

Whichever standard is used, it is also important to remember that the standard will be explained in terms of "at or below" a certain income level. In looking at such a standard, a natural tendency is to look at the ceiling. If, in other words, the standard is "at or below \$15,000," people tend to look at \$15,000. It is important, however, *not* to assume that households who are at or below a certain Poverty Level are *at* the ceiling. Of the 250,000 households who live at or below 150 percent of Poverty in Colorado, nearly 150,000 live at or below 100 percent. The average Colorado household living at or below 100 percent of Poverty lives, in fact, at 56 percent of the Poverty Level. Of the households living at or below an annual income of \$15,000, nearly one-quarter live with annual incomes of at or below \$5,000.

In sum, making a determination of how many poor people live in Colorado depends in large degree upon how one defines what it means to "be poor." Estimates of Colorado's low-income population can range from 250,000 to more than 500,000 households. Even within these ranges, people do not live *at* the ceiling of the definition. The lowest reaches of the "or below" part of the phrase "at or below" encompasses a substantial number of Colorado households.

FEDERAL FUEL ASSISTANCE IN COLORADO

The primary fuel assistance program in Colorado is the federally-funded Low Income Home Energy Assistance Program (LIHEAP). Through LIHEAP, the state provides basic cash grants to income-eligible households to cover home heating bills. In its essence, Colorado directly measures the energy burdens which each of its LIHEAP recipients bears in a particular year. The state then commits to buy down that heating burden to a designated percentage of income.

During the most recently completed Fiscal Year (FY 1995), LIHEAP provided basic cash fuel assistance to 61,226 households through June 1, 1995. Average grants in FY 1995 were \$252. The greatest portion of these basic cash benefits went to the poorest households in the state. More than 10,000 Colorado households (10,1886) with incomes less than \$4,000 were served by LIHEAP in FY 1995, and more than 24,000 households (24,180) with incomes less than \$6,000 were served. Of Colorado's 61,226 LIHEAP recipients overall in FY 1995, only 4,218 had incomes of \$15,000 or more.

Despite these numbers, LIHEAP still fell far short of serving the low-income population of Colorado. Roughly 253,000 Colorado households live at or below LIHEAP's 1995 eligibility standard of 150 percent of the federal Poverty Level. LIHEAP provided basic cash assistance to only 61,226 of those households, or roughly 24 percent. In addition to serving but a fraction of the number of households, LIHEAP covers but a fraction of the home heating bills even for those who *do* receive assistance. Statewide, the average basic cash benefit of \$252 paid only 54 percent of the average home heating bill (\$465) of LIHEAP recipients.

LIHEAP has never been adequately funded on a national basis, and those inadequate federal budgets have translated directly into inadequate funding at the state level in Colorado. In addition, given even further reductions in federal LIHEAP dollars in recent years, Colorado has seen a steady erosion in its ability to serve low-income households. While Colorado's LIHEAP program received roughly \$33.3 million in Fiscal Years 1984 and 1985, by Fiscal Year 1995, that federal appropriation had fallen to only \$20.7 million.

As part of the federal budget impasse in the fall of 1995, Congress failed to appropriate funding to continue the LIHEAP program. Under Presidential order, however, a limited amount of funds was released nationally for states to operate the program. Not surprisingly, the Colorado program was virtually emasculated. The federal reduction in fuel assistance for FY 1996 will have four major impacts in Colorado: (1) it substantially reduces the eligible population (from 150% to 115% of the federal Poverty Level); (2) it eliminates the program altogether during a substantial part of the winter (for bills to pay for usage in February, March and April); (3) it eliminates important crisis protections (for households who cannot operate a natural gas furnace because the electricity necessary to operate the furnace fan and thermostat has been disconnected); and (4) it disproportionately affects the working poor (by

eliminating child care deductions).

OTHER ENERGY-RELATED PUBLIC ASSISTANCE IN COLORADO

Government funds to help pay low-income energy bills, other than through LIHEAP, are *extremely* limited in Colorado. From the perspective of public assistance to help pay low-income home energy bills in Colorado, LIHEAP is by far the major player. A "general assistance" program exists, which represents a government program providing limited emergency funds for a variety of purposes (*e.g.*, food, shelter, energy) to households who do not qualify for other public assistance, but the extent of General Assistance is measured in thousands of dollars statewide. Emergency assistance provided through the Federal Emergency Management Act (FEMA) is also measured only in tens of thousands of dollars.

Colorado does have a property tax credit (PTC) program which incorporates a component providing credits for heating bills actually paid. While the PTC program distributed more than \$11 million in benefits to eligible residents, these funds included property tax/rent rebates along with heating rebates. Created in 1987, the PTC program has not adjusted either its benefit levels or its income eligibility criteria since its inception.

Even the major public assistance program other than LIHEAP which *does* exist has major problems. Similar to this program nationwide, and contrary to statute, the utility allowances adopted for Section 8 assisted housing universally fail to pay for either home heating or home energy costs.

The preservation of a fuel assistance structure in Colorado is essential to providing assistance for unaffordable home energy bills. The elimination or significant curtailment of LIHEAP in Colorado would leave virtually no publicly-funded assistance program to help pay low-income utility bills.

ENERGY-RELATED PRIVATE ASSISTANCE IN COLORADO

The major sources of private fuel assistance in Colorado are limited to just a few organizations. The Colorado Energy Assistance Foundation (CEAF) is a non-profit fundraising organization under the direction of the Colorado Commission for Low-Income Energy Assistance created by Governor Romer in 1988. In turn, in 1989, that Commission created CEAF, which was designed to bridge the gap between the growing need for heating assistance statewide and the decreasing availability of federal funds. CEAF awards an annual contribution to the state LIHEAP agency for winter energy assistance and approved special projects. CEAF moneys are *not* used to cover LIHEAP's administrative costs. In the 1993 - 1994 winter heating season, roughly 180,000 individuals were helped through CEAF assistance.

In addition to this winter heating assistance, CEAF has provided other types of assistance to

promote affordable home energy bills. In 1994, for example, CEAF started an energy assistance grants program to assist households from May through October, the months during which LIHEAP does not operate. In 1995, more than \$300,000 was distributed through 19 agencies helping approximately 2,000 families.

Customers of Colorado Springs Utilities (CSU) are served by a local fuel fund called Citizens Option to Provide Energy (COPE). COPE is a locally-funded program that provides additional emergency assistance to CSU customers when all other aid resources are exhausted. COPE's funding comes entirely from donations by CSU customers and employees. COPE's distributes roughly \$90 - \$100,000 each year through five not-for-profit agencies. COPE provides assistance to roughly 900 - 1,000 households per year.

The Colorado Natural Gas Assistance Foundation is a Colorado non-profit organization created in 1987 to generate gas utility assistance funds for low-income Colorado residents. To that end, the Foundation created a wholly owned subsidiary, the Colorado Natural Gas Assistance Corporation, to raise funds and deliver benefits to users of natural gas. The American Red Cross administers the Foundation's utility assistance programs in Weld County. Assistance programs include direct gas utility payments, security deposits for utility services, and furnace/space heater replacements. Total financial assistance to Weld County residents and non-profit social service agencies through 1995 is approximately \$880,000. Roughly 5,000 utility customers have received direct financial assistance to date.

In addition to these private fuel funds, one of the major players in providing private fuel assistance in Colorado is Metro CareRing. Over the past three years, Metro CareRing has served more than 1,100 clients, distributing roughly \$125,000 in low-income energy benefits. Even Metro CareRing, however, does not bring its own source of funding to bear on the low-income energy problem. Of the \$127,000 distributed through Metro CareRing since 1993, less than \$8,000 was provided from that organization's "own" resources. In contrast, Metro CareRing distributed more than \$66,000 in funds provided through CEAF and roughly \$53,000 in FEMA dollars. Thus, as can be seen, roughly 95 percent of the "private" fuel assistance distributed through Metro CareRing, in fact, involves public dollars.

Outside of these major efforts, private sources of funding provide limited but important "crisis" fuel assistance in the State of Colorado. These sources of funds are "important" in that they provide a ready place for persons dealing with low-income payment problems to refer clients for cash assistance. In addition, there is significant coverage throughout the state from these private sources of fuel assistance.

Several observations are possible about private fuel assistance programs:

- o The provision of private fuel assistance in Colorado is not simply an urban phenomenon. Without addressing whether the available funds are sufficient to meet the need, it is nonetheless possible to conclude that persons dealing

with rural payment problems have places to turn.

- o The "typical benefit" from these private sources of energy assistance is very small, almost across-the-board, being in the \$50 - \$100 range.
- o Not surprisingly, most places limit their grants to a specific geographic area.
- o There is, however, a surprising lack of non-geographic restrictions on private fuel assistance in Colorado. Restrictions limiting grants to, for example, the elderly and disabled are not prevalent. Virtually all private assistance agencies, however, require that the household seeking assistance demonstrate a crisis by receipt of a shutoff notice.

In sum, there are many places in Colorado that give out "a little" money, a few hundred dollars that help just a few families.

THE ROLE OF ENERGY EFFICIENCY

When all is said and done, for households who truly cannot afford their energy bills only two broad strategies are available. These strategies can be pursued alone or in combination with each other. In responding to the inability to afford home energy bills, either one can increase household income or one can reduce household expenses. The household expense at issue here, of course, is the household home energy bill. While other responses may be necessary and appropriate to address certain *consequences* of low-income inability-to-pay --a winter moratorium is one example of such a regulatory response-- only the income and expense strategies will directly address the root cause of the problem.

Providing cash assistance is probably the primary approach to addressing low-income inability-to-pay problems. Cash assistance can help meet winter emergencies, can address the problems of even the lowest income households, and can be used to meet immediate needs. Addressing low-income energy problems, however, involves more than simply providing cash fuel assistance. While cash assistance is unquestionably necessary, particular during high cost winter months, a low-income agenda must include, also, energy efficiency improvements.

Weatherization can be an effective tool to use in reducing low-income energy needs for many, but not all, households. In fact, the plight of many of the households most significantly in need can be addressed through increased efficiency in usage. It is generally recognized that weatherization assistance is a more efficient means of addressing low-income energy needs over the long term than the distribution of fuel assistance. Weatherization provides continuing benefits year-in and year-out. Fuel assistance, on the other hand, provides a one-time cash supplement to help pay current utility bills (including arrears in some cases). Each year, a new one-time cash supplement must be provided.

Like fuel assistance, however, weatherization has substantial limitations that limit its effectiveness.

- o It is inadequately funded. Federal Weatherization Assistance Program (WAP) dollars will never be adequate to provide services to all eligible low-income homes needing weatherization within a reasonable period of time.
- o Even if adequately funded, there are functions that weatherization simply cannot serve, and populations that weatherization simply cannot help. While weatherization, for example, can reduce future bills, it cannot help pay unaffordable arrears.
- o Even at peak efficiency, weatherization can make only a small dent in the needs of low-income households. Even if WAP were successful in reaching all homes, the scope of the program is more limited than low-income households need. Weatherization programs generally deal only with space heating, that energy which goes into what people generally consider to be the control of the temperature of the house. In Colorado, however, heating the home (*i.e.*, "space heating") represents less than 40 percent of a household's energy bill. Thus, for every two percent of heating energy saved through a weatherization program, less than one percent of the *total* energy bill would be saved.
- o Finally, for some households with very low-incomes, no amount of weatherization will be able to bring their bills low enough to be "affordable" from a percentage of income perspective. The winter heating burdens faced by low-income households are not simply a function of high energy bills, but instead are a function of the interplay between energy bills and income. Weatherization alone is inadequate to redress the mismatch between household heating expenses and household resources available to pay those expenses. Some households simply have so little income, virtually *any* energy bill will be burdensome.

In sum, weatherization dollars, standing alone, can *never* completely address the weatherization and conservation needs of low-income households. While it is imperative to increase the efficiency of low-income energy use to the maximum extent possible, it would be unwise to focus attention strictly on energy efficiency. Hence, whatever the level of effort or funding for low-income energy efficiency, there will always be a need for a cash supplement program. Energy efficiency, while an adequate long-term solution for many, simply cannot address the energy problems for the lowest income households with the highest energy burdens.

LOW-INCOME ENERGY USE AND ENERGY BILLS IN COLORADO

The three primary space heating fuels for low-income households in Colorado are natural gas, electricity and LP gas. Natural gas is the primary fuel used for space heating by low-income residents of Colorado by a substantial amount. Statewide, roughly 80 percent of low-income households use natural gas as their primary heating fuel. In contrast, electricity is the primary fuel for space heating in 14 percent of low-income Colorado households. LP gas falls even further behind, being used by four percent of low-income households.

While low-income energy use, as well as low-income energy bills, is substantially less than that of the average household in Colorado, the *burden* which such bills place on low-income households is considerably greater. Even though low-income households use only 80 percent of the total home energy as the average household, and pay only 70 percent of the bill, the total home energy expenditures --not simply expenditures for heating-- for the poor represent a burden almost four times (3.9x) as great (5.6% vs. 21.8%).

This increased burden occurs despite the fact that, unlike many other states, the poor in Colorado do not disproportionately rely upon more expensive heating sources such as electricity. While 70 percent of all households use natural gas for heating (and 17 percent use electricity), 80 percent and 14 percent of low-income households use gas and electricity respectively.

While these figures are correct statewide, they are misleading when applied to individual counties. In many counties in Colorado, households do, indeed, rely upon expensive sources of heating. Thus, for example, even though propane represents the primary heating fuel in only four percent of homes statewide, it is used as the primary source of space heating by more than 30 percent of the population in 20 counties in Colorado and by more than 20 percent of the population in an *additional* 12 counties.

Evaluating heating usage, however, should not be the exclusive focus of an examination of home energy bills. In Colorado, the average low-income household pays less than 40 percent of its home energy bill on heating. To address unaffordability problems, in other words, will require an effort to address total home energy, not simply heating.

The cost to make home energy "affordable" to low-income households is considerable. Defining the low-income population to be those households at or below 150 percent of the federal Poverty Level, defining "affordability" to be the average energy burden of households generally, and assuming that 100 percent of the low-income population is reached by an affordable rate program, the cost to make total home energy bills affordable for the poor is more than \$196 million, while the cost to make simply home heating bills affordable is roughly \$66 million. Changing assumptions can dramatically change these costs. For example, reducing home energy bills to ten percent of income (rather than to the total population average) reduces the total cost to \$125.0 million. Reducing home energy

bills to twelve percent of income reduces total costs to \$93.2 million.

LIHEAP PERFORMANCE REVIEW

One recent move in evaluating state LIHEAP programs has been to introduce a greater degree of performance management into the program. According to federal LIHEAP officials, "in the past, much of the focus on measuring success has been on the effort expended and resources dedicated to a program by a government agency (what are known as `inputs') and on the number of beneficiaries assisted (the `output'), rather than on the effect the program has on the beneficiaries (the `outcome' or `impact'). Recently, consensus has been reached that input and output measures do not necessarily indicate success, if the assistance offered is not helpful to the person or entity receiving it. For this reason, there is increased emphasis on looking at the effect programs have on their recipients in order to measure their success."

Those officials continue: "Accordingly, there is now general agreement that programs must determine and describe the outcomes they expect to achieve (*i.e.*, they must manage for results). Instead of focusing exclusively on inputs and program activities, programs need to concentrate on the program's impact on people."

The two primary goals adopted by the federal LIHEAP office include:

- o To target energy assistance to low-income households with the highest home energy needs, taking into account both energy burden and vulnerable household members. and
- o To increase energy affordability for LIHEAP recipient households.

As is found above, the Colorado LIHEAP program is insufficiently funded even to attempt to make total home energy affordable for low-income Colorado residents. Given existing resources, any effort which may be made to address total year round home energy burdens is likely instead only to dilute the available resources so as to make the program ineffective overall. If a focus is kept on home heating bills, however, the program can improve its efforts to address affordability by increasing the period during which heating bills are considered to include the "shoulder" months of the heating season. Even this recommendation, however, may be unmanageable in light of recent federal funding cutbacks. Deep cutbacks in federal dollars have resulted in reduced, not expanded, benefits as well as a reduction in the number of months the program operates. Beginning in Fiscal Year 1996, LIHEAP in Colorado was open only for four months a year rather than the full six months of the winter heating season as in the past. While taking the additional heating needs of October and May into account would make good policy sense, even this cannot be done at existing funding levels.

Finally, from a targeting perspective, on the one hand, Colorado does an excellent job of targeting assistance to households with elderly members. Insufficient data exists to calculate a performance measure for households with children or households with disabled members. On the other hand, there is little targeting based on high shelter burdens (standing as a surrogate for high energy burdens). Again, however, it is difficult to separate total home energy from home heating. This lack of targeting, therefore, may simply reflect the lack of adequate resources. Recent budget realities have forced LIHEAP to reduce, rather than to expand, benefits. Changing the targeting mechanism from one based on heating to one based on total home energy would depend upon a permanent source of supplemental funding for fuel assistance.

INNOVATIONS IN FUEL ASSISTANCE AROUND THE COUNTRY

Given the expense associated with making low-income energy burdens affordable, combined with existing and pending cutbacks in federal fuel assistance funding, it is important for Colorado to emulate successful models of fuel assistance from around the nation. These models should involve more than mere innovations in the distribution of existing LIHEAP dollars, but should rather look at a variety of tried and untried government and non-government endeavors. The discussion below reviews a variety of initiatives to glean lessons for possible Colorado application.

Utility Programs

Perhaps the most important low-income fuel assistance program structure outside LIHEAP and federal subsidized housing utility allowances involves the delivery of rate discounts through public utilities. While clearly not all low-income Colorado households use utility fuels such as natural gas and electricity as their primary heating source, nonetheless, the existence of electricity is nearly universal and the combination of gas and electricity heating covers *nearly* all (95%) low-income Colorado residents. A variety of program designs, target populations, and justifications exist for the utility programs which exist around the nation.

The Pennsylvania Customer Assistance Programs (CAPs) represent the most comprehensive statewide trial effort on the part of utilities to address the payment problems of low-income households.

According to the Pennsylvania Public Utility Commission (PUC) staff, initial evaluations of the various CAP programs have not yet been completed. Nonetheless, Equitable Gas has an evaluation which, as of November 20, 1995, was "imminent" and Pennsylvania Power and Light (PP&L) has "preliminary" data on which that company is willing to rely. According to the PUC staff, PP&L found that participants in their CAP did *not* increase usage in response to the reduced price for energy. In addition, and more importantly, PP&L found that winter payments from CAP participants increased from forty percent (40%) the year before the

program to 86 percent in the first year of the program. Of 815 participants, PP&L found, 326 had made four or more winter payments (October - March) in the 1993/1994 heating season (pre-program) while 700 made four or more payments during the 1994/1995 winter season (while on the program). Finally, PP&L found that few CAP participants failed to make their required payments. Of the 1700 participants, the PUC staff reported, only 84 were defaulted for nonpayment during the first 15 months of the program.

Utility Rate Design Initiatives

Not all utility programs must be considered low-income affordable rate programs. Some utilities have simply adopted rate designs that are either explicitly or implicitly directed toward providing energy assistance to low-income households. The difference between a rate design initiative and an affordable rate program is that rate designs represent decisions based on differing methods of cost allocation rather than program decisions based on income considerations. Similar policy purposes can be pursued through either rate design initiatives or affordable rate programs. The distinction lies largely with the underlying justification of the prices ultimately approved.

Rate design proposals in Texas and Washington D.C. are significant in that they seek to deliver energy assistance through application of normal rate design. The RES ("Residential Essential Services") rate in Washington D.C. varies the discount depending upon the income and size of the household. A qualifying household subsisting at a relatively low percentage of the federal poverty level (*i.e.*, whose income is very low relative to household size) obtains a higher discount than a qualifying household whose income relative to household size is higher. Specifically, households subsisting on incomes between 0 and 50 percent of the federal Poverty Level are entitled to a 21.01 cents (25 percent) per therm discount on their commodity charge; a discount of 16.81 cents (20 percent) per therm applies to participating households living between 51 and 100 percent of the federal Poverty Level; and participating households whose incomes are between 101 and 150 percent of the federal Poverty Level are entitled to a discount of 15.78 cents per therm.

In contrast, the ERS ("Economy Residential Service") tariff of Central Power and Light Company (Corpus Christi) is not a rate targeted low-income households. Instead, the ERS rate is available to all individually metered units that are used for primary residential use; second homes, in other words, are not covered by the tariff. The tariff provides that existing customers will be eligible for the ERS rate only if during the past twelve months, the consumption for those customers has been 500 kWh or less.

These rates do not explicitly set rates based on income or percentage of income burdens, although the D.C. rate has a discount which varies based on the Poverty Level of the rate participant. They do not rely upon LIHEAP nor do they seek a cost justification based on any economic analysis that the savings generated by the rate exceed the amount of the discount. Their emulation deserves consideration.

Bulk Fuel Vendor Programs

As is noted in other parts of this report, while 95 percent of low-income Colorado residents heat with natural gas or electricity, it would nonetheless be inequitable to a substantial portion of Colorado's low-income population to focus attention *exclusively* on utility assistance programs. Some counties have a very high penetration rate of fuels other than natural gas, yet have insufficient numbers of households overall to affect the statewide average.

While most programs that deal with delivering financial assistance to bulk fuel customers have arisen in states concerned with fuel oil energy burdens, the lessons learned from such programs can provide important insights to what would be Colorado's focus instead on propane users. Five basic types of bulk fuel programs exist that might apply to Colorado's low-income population which relies on propane for heating. These include:

- o A negotiated agreement to provide fuel at the cash price rather than the credit price for LIHEAP recipients;
- o A negotiated across-the-board percentage discount on bulk fuel purchases by LIHEAP recipients;
- o A fixed "margin over rack" program;
- o A "summer fill" program; and
- o Winter protections for bulk fuel vendors, without additional financial assistance.

Non-LIHEAP-Based Direct Vendor Programs

The pursuit of non-LIHEAP-based direct vendor programs is one means through which both utilities and low-income households might benefit. Through a direct vendor program, in exchange for consideration, a low-income household agrees that a public benefit to which the household is entitled to receive unrestricted cash is, instead, earmarked for payment to the utility and paid directly to that company. Direct vendor payment programs, of course, can be developed for bulk fuel vendors as well; they are not uniquely suited to utilities.

A utility should offer some payment to gain the participation of low-income households in a non-LIHEAP direct vendor payment program. This payment would be necessary since a refusal to enter into a direct vendor program would retain for the household the greatest discretion and control over its entire month-to-month allocation of household resources. Without such participation, in other words, the household retains the discretion to divert the public assistance to uses such as food and clothing in low-bill months. The payment to be made by the utility to gain participation in a direct vendoring program should be a commitment to forgive the "excess" bill over the direct vendor payment. The treatment is justified. In the direct vendor payment program, the household cedes all discretion over the use of the utility payment. The forgiveness should be as automatic as the payment.

Direct vendor programs around the country, which are not common, involve both AFDC and subsidized housing benefits.

Tax Programs

Expenditures by businesses in Colorado need not necessarily involve the direct expenditure of state funds. Instead, the state could establish tax incentive programs designed to promote the formation and funding of public/private partnerships.

Tax programs designed to provide incentives for Colorado corporations to take an active role in helping to address the issues of poverty are one important tactic to use in providing fuel assistance for the poor. Such a program in Colorado could be modelled on the Neighborhood Assistance Act Program in the State of Connecticut. A Colorado Neighborhood Assistance Act Program could include winter heating and crisis assistance, as well as the funding of energy efficiency improvements. This effort, in other words, would include sufficient funding to permit the inclusion of energy interventions for households at or below 150 percent of the federal Poverty Level, including the provision of energy efficiency improvements.

Ratepayer Assistance Trust Fund

Fuel assistance initiatives in other states do not necessarily have to succeed in order to

provide important lessons, and ideas, for use by others. Arizona's effort to capitalize a low-income energy assistance fund is one such program. In 1992, the Arizona legislature enacted a ratepayer assistance trust fund that would have raised from \$44 to \$55 million to supplement the state's LIHEAP program. Utilities, who actively supported the legislation, were asked to agree to place into the fund a voluntary .006 percent annual assessment for five years, after which each year's interest from the fund would have gone in perpetuity to supplement the state LIHEAP program. The program fell apart when the state Corporation Commission refused to allow utilities to automatically pass along the costs of the program to ratepayers.

According to Arizona officials, the trust fund concept still appears to have been a reasonable mechanism to generate additional dollars for fuel assistance. The trust fund concept may have worked, it is believed, if there had not been a strict deadline as to utility company participation and if questions as to who should pay for the assessment --utility customers or shareholders-- were resolved either through legislation or through some expedited single-issue regulatory procedure.

Promotion of the Earned Income Tax Credit

One program that is not explicitly an "energy assistance" program, but which delivers extensive benefits to low-income households to use for paying home energy bills, involves the efforts of many utilities to promote participation in the federal Earned Income Tax Credit (EITC). Some utilities have become extremely aggressive in promoting the enrollment by low-income households in the EITC. One utility, Public Service Electric and Gas Company (PSE&G), in New Jersey, found that the additional resources represented by the EITC would help alleviate many bill payment (and inability-to-pay) problems by low-income customers.

This effort is an indirect, but substantial, source of "fuel assistance" for low-income households. According to one article published by an Edison Electric Institute (EEI) staffperson, 25 percent of the low-income households receiving EITC credits used their credits to pay current utility bills while an additional 30 percent used their credits to pay past-due utility bills.

Title IV-A Leveraging for Emergencies in Households with Children

Colorado has, in recent years, tapped into leveraged dollars to use in emergencies affecting households with children. Colorado uses CEAF dollars to leverage millions of dollars of these federal emergency funds. To obtain these dollars, CEAF makes a contribution of funds to the state with those funds then being used as the state match for the additional federal benefits.

Other mechanisms exist, however, to generate the state match for these federal dollars, which would, in turn, free up CEAF funds to be used for additional purposes.

Pennsylvania has for several years used Title IV-A funds to provide special needs allowances for households receiving benefits under the Aid to Families with Dependent Children (AFDC) program. This separate AFDC-funded energy program is operated concurrently with the LIHEAP program, and frees LIHEAP program funds that would have ordinarily been granted to these Title IV-A eligible households for use by other households eligible for LIHEAP benefits. According to Pennsylvania LIHEAP officials, the Title IV-A program provides \$55 in Federal funds to match approximately \$45 in State funds for the special needs allowance. Oil overcharge funds are used for the state match in Pennsylvania. It is not clear what, if anything, will be done by the state when those matching funds are exhausted.

The Wisconsin approach to Title IV-A begins to address the issue of what to do when oil overcharge funds are not available. Wisconsin continues to develop a proposal under which utilities in Wisconsin --or at least the large investor-owned "class A" utilities-- will provide a grant to the Wisconsin Department of Health and Social Services for an expanded emergency furnace assistance program and crisis assistance program. These funds will be used for households where children are at risk because of an inoperable or unsafe furnace or because children are threatened with loss of heat due to the actual or pending disconnection of a utility service because of unpaid arrearages owed on a utility bill.

Under the proposed Wisconsin program, utilities will contribute funds to the state General Fund for use in the LIHEAP program. The funds provided by the utilities will be unrestricted and available to the state to determine their use. The state has made a decision to utilize these funds in the AFDC Crisis Assistance Program to better meet the needs of AFDC families as defined under the state's existing AFDC emergency assistance program.

DECIDING UPON FUNDING RECOMMENDATIONS

No question exists but that there is a need for additional funding for low-income energy assistance in Colorado. According to the calculations above, if the state were to serve 100 percent of the need for 100 percent of the low-income population (defined to be those households at or below 150 percent of the federal Poverty Level), the cost would exceed \$195 million a year. Obviously, no single source of funds can be relied upon to meet all or any substantial part of that need. Choices will have to be made.

Criteria for Determining Funding Options

In making such choices, there are 16 criteria that should be considered.

1. **Repeatable:** A funding source should be repeatable each year.
2. **Stable (not a legislative appropriation):** In a similar vein, a funding source

should generate a stable source of revenue. There should not be substantial year-to-year fluctuations in funding. Moreover, the funding source for fuel assistance should be made a permanent structure of the Colorado landscape.

3. **Ubiquitous if not universal:** Fuel assistance should be wide spread.
4. **Targeted to need:** Fuel assistance should not simply be an alternative income transfer program. If fuel assistance is to serve its unique role, it should be targeted to households having an *energy* need.
5. **Enough to matter:** If the state is to make a commitment to any particular source of fuel assistance dollars, that funding source should generate enough dollars to make a difference.
6. **Cheap enough to do:** The counterpart to the "enough to matter" criterion is that any fuel assistance program which is considered must be within the financial capability and political wherewithal of the state to accomplish.
7. **Easy to access: initially and each year:** Fuel assistance that is not easily accessible to the low-income population does not serve any particularly useful function.
8. **Multi-fuel capability (alone or in combination):** Not all components of the fuel assistance program must reach all primary heating fuels. But the portfolio of programs must have something for everyone.
9. **Promotes "good" behavior:** The concept of "the deserving poor" should be soundly rejected. Nonetheless, fuel assistance programs can be designed to promote desirable behavior: taking care of arrears, making regular monthly payments, engaging in sound budgeting.
10. **Administratively simple:** Administrative simplicity is an attribute that implicates both the success of the program and the expense of the program.
11. **Independent of social welfare:** One primary barrier to participation in existing fuel assistance programs is the historic tie that these programs have had to the existing public benefits system. While that tie is necessary and good, there must be *some* component which is independent of public assistance.
12. **Permanent:** A funding source for fuel assistance should be made a permanent structure of the Colorado landscape.

13. **Home energy, not just home heating:** While images of persons freezing in a Colorado winter are perhaps what come to mind when thinking about the need for fuel assistance, home heating need not be the exclusive focus of a fuel assistance program in Colorado. Indeed, home heating represents just over half of the total home energy use of low-income Colorado residents and *less* than half of the home energy bill. One option available for generating fuel assistance is to generate sufficient funds to address total home energy, not just home heating.
14. **All parties, public and private, recognize their part:** Given (a) the need for greater resources; (b) the adverse impacts on the community from unaffordable home energy burdens; and (c) the substantial benefits that flow to the energy industry as a result of fuel assistance, an expanded public/private partnership is an essential component of new Colorado fuel assistance programs. Each party to the bargain --this includes the low-income household, the government, the community-at-large, and the energy vendor-- should contribute in some fashion to resolving the inability-to-pay problem.
15. **Liquidating in the long-term:** While for all of the reasons outlined in the text above, this report does not address the funding and delivery of energy efficiency, the government and industry components of any fuel assistance program should be structured such that the cash supplement responsibilities are potentially liquidating to some degree through the implementation of energy efficiency measures.
16. **Supplement not supplant:** The design of a new fuel assistance program should be concerned with the opportunity costs of "new" investments in low-income fuel assistance. These opportunity costs represent circumstances where the investment supplants rather than supplements funds available for low-income energy needs. If the funding newly channeled to fuel assistance had not been spent on low-income energy needs, in other words, would it otherwise have been spent on low-income housing, or job creation, or education? To displace current program funds by funding currently devoted to other projects with beneficial impacts for low-income households may very well result in net losses to the constituent community.

Examples of Potential Funding Sources

A variety of potential funding sources are evident from the discussion thus far. Taking primarily examples from other states, and projecting them on to Colorado, would result in the following:

1. Arizona's proposal was for electric and natural gas utilities to contribute .006 percent of their annual gross revenues for a five year period to create a Ratepayer Assistance Fund.
2. One New Jersey utility, in conjunction with a variety of public and private agencies, undertook an extensive promotion to enroll eligible households in the federal Earned Income Tax Credit (EITC). The goal of the promotion was to increase enrollment by at least five percent.
3. Two states, Massachusetts and Connecticut, have implemented "margin over rack" pricing for their LIHEAP recipients who heat with fuel oil. According to the LIHEAP officials in those states, the margin over rack program saved LIHEAP recipients between eight and ten percent of their winter fuel oil heating costs. Such a program is possible for propane users as well.
4. Colorado should consider a campaign where tax exempt institutions would pay the equivalent of what they would have paid in sales tax on their utility bills in the event that the institution did not have a tax exempt status. Such a contribution in lieu of taxes could be structured similar to the new Illinois Telephone Assistance Program, which was created by state law and is based on voluntary contributions to fund assistance to low-income families who need basic local phone service.
5. One way to expand the dollars available for low-income energy assistance in Colorado is simply to preserve the purchasing power, and income eligibility limits, for the PTC program at their original constant dollar level.
6. A tax credit directed toward a different vulnerable population --the working poor-- is also possible. Seven states have created a state Earned Income Tax Credit that generally ranges from 15 to 20 percent of the federal EITC.
7. Most utility fuel funds today seek to generate dollars from their customers through the solicitation of voluntary contributions of money. One additional proposal that merits consideration is for utilities to ask their customers to donate their money *and* to donate "desired behavior" which might generate both convenience for the customers and cost savings for the utility. Some of these cost savings could then be passed along as donations to low-income fuel assistance. One type of "desired behavior" comes readily to mind: the enrollment of customers in "direct payment

arrangements." Such a payment scheme would be modelled on insurance and related industries who directly draw payment of bills from a customer's checking account at the time the bill is rendered.

8. Wisconsin's utilities have agreed to cooperate in a program to take advantage of the matching grant provisions of the federal emergency benefits for AFDC households. For the reasons articulated by the Pennsylvania LIHEAP office, such a program can perhaps be more fruitfully limited to the "special needs" allowance under AFDC. Under federal law, "special needs" may be recurring or nonrecurring and are usually defined as those needs that are recognized by the state as essential for some persons but not for all, and therefore, must be determined on an individual basis. Colorado utilities could follow the lead of the Wisconsin companies in providing the capital to generate the up-front state dollars needed to gain the federal matching funds.
9. In addition to looking for some type of broad-based revenue raising measure to support fuel assistance in Colorado, the state should pursue at least one component that relies upon "voluntary giving." Colorado should thus consider the merits of developing an "adopt a family" program for institutions large to small. Through such a program, each participant could commit to adopting a "family in crisis" to provide at least one crisis payment.
10. The "adopt a family in crisis" approach to developing local solutions to energy crises facing low-income households is consistent with the "one church--one family" initiative proposed by the National Urban and Rural Ministry Project of World Vision. According to World Vision, the "one church--one family" process works as follows: "The church commits to a long-term relationship, usually of one year, with a recently displaced family. The church pays three months' rent to resettle the family into housing: the first, the last and one middle month. Church volunteers break into task forces to work with and assist the family in a specific area of the family's life. The volunteers, trained to avoid dependency relationships with the family, encourage progression to self-sufficiency."

While the purpose of this research is not to develop new sources of funding for low-income energy efficiency initiatives, given the importance of delivering continuing dollars of fuel assistance (through reduced bills), and the recommended criteria that fuel assistance be self-liquidating (at least in some part), it seems unreasonable to completely ignore potential energy efficiency funding possibilities. Two such possibilities exist:

1. The state of Nevada has capitalized a housing trust fund through the imposition of a fee on real property transfers. Under the Nevada scheme, a fee of 10 cents per \$500 of assessed valuation goes into the state Housing Trust. A similar fee could be imposed in support of low-income energy efficiency in Colorado. Rather than placing such a fee on all property transfers, however, a higher fee might be placed on

fewer transactions: new residential building construction (and building alterations).

2. Low-income energy efficiency initiatives can be funded through a fee on energy consumption as well. Such a fee could be based on the model of the Vermont Home Weatherization Trust Fund. In a statute effective July 1990, the state General Assembly created the Home Weatherization Trust Fund, administered by the director of the state WAP agency, the Vermont Office of Economic Opportunity. The Vermont funds generated for the Trust Fund are to be commingled with WAP appropriations and are to be expended consistent with the Weatherization program. The Vermont Trust Fund is financed, at least in part, by a gross receipts tax of 0.5 percent on the retail sale of certain types of fuel by sellers receiving more than \$10,000 annually for the sale of such fuels. The fuels include heating oil and kerosene not used to propel a motor vehicle, propane, natural gas, electricity and coal.

NONPARTICIPATION IN FUEL ASSISTANCE PROGRAMS

It matters not whether fuel assistance programs are adequately funded if the households who need those benefits to make energy burdens affordable either cannot or do not participate. One of the ongoing issues facing state policymakers, therefore, involves not how to distribute benefits to households who receive fuel assistance, but rather how to distribute funds to those who do *not* receive it. In general, if a substantial portion of the population knows about and understands the availability and advantages of obtaining fuel assistance benefits, but chooses not to participate in any event, there is nothing for the state to be concerned about. If, however, non-participants either do not know about fuel assistance programs, or face some obstacle which *prevents* participation, Colorado officials should be taking actions to address and overcome those failures. An evaluation of nonparticipation should look at both participation in LIHEAP as the major public program and the various programs providing private fuel assistance in the state.

Nonparticipation in LIHEAP

The primary obstacle to participation in LIHEAP is the lack of information. Some demographics are more important than others in making a determination of who might not know about the availability of LIHEAP benefits. Based on data specific to Colorado, persons who are disproportionately represented in the populations that report not knowing about LIHEAP include persons aged 65 and older, non-English speaking households (and particularly non-English/non-Spanish speaking households), Blacks (but not Hispanics), and unmarried households. In contrast, participation in other public benefit programs has a substantial positive effect on knowledge about LIHEAP while the months of residence at a particular location and either fulltime or part-time employment appear to have little or no impact on knowledge of LIHEAP.

The primary importance of the discussion above as to LIHEAP reform does not lie with the number of households who choose not to participate in the program despite their knowledge of the program. The importance lies instead with the number of persons who report barriers that prevent their participation irrespective of their knowledge of the program. Despite the efforts by LIHEAP to minimize factors that might interfere with LIHEAP participation, reported barriers to LIHEAP participation are many. A misunderstanding of the eligibility requirements (mistakenly believed that they were not eligible or that their income was too high), "process" problems (application forms too complicated or inability to obtain needed assistance in applying), and physical access problems (transportation unavailable), are all barriers that need to be further considered for resolution.

Given the number of households above who cite the facts that they have negotiated payment plans due to an inability to pay, as well as the fact that the households who were surveyed are participants in other public assistance programs, there would seem to be an infrastructure upon which to build to ensure that households who know about LIHEAP, and desire to participate, are not excluded due to some extraneous barrier such as those listed above. The answer may well lie as much with the creation of innovative partnerships in allowing outreach and intake as in any fundamental reworking of the LIHEAP network.

The final lesson from a comparison of nonparticipants is not particularly profound, but it is important nonetheless. The greater the contact between a payment-troubled household and either the utility or the state fuel assistance network, the more likely it is that the household who is facing payment-troubles will be able to work out a payment plan or partial payment with the utility. In this regard, it would seem not to matter whether a household learns of LIHEAP through its contact with the utility in negotiating a payment plan or *vice versa* (negotiates a payment plan because of its contact with LIHEAP).

Nonparticipation in Private Fuel Assistance

Given the possibility that future fuel assistance efforts in Colorado will *not* involve the LIHEAP network, it is important, also, for policymakers to understand why low-income households might not avail themselves of private fuel assistance initiatives. The overwhelming message regarding non-participation in private fuel assistance programs in Colorado is the lack of common knowledge about such programs. There appears to be little knowledge of private fuel assistance outside the context of the LIHEAP program. More than eight of ten households who did not participate in LIHEAP did not even know of the availability of a private alternative. Fewer than two of every 100 low-income households knew of a private source of dollars while not having heard of LIHEAP.

The news is not all bad, however. Private assistance does appear to somewhat fill in a gap for those households who say that they simply do not want to take money "from the government." Of the 202 households who said they did not apply for LIHEAP benefits for this reason --a total of 500 households were surveyed-- 47 indicated that they knew about

private assistance alternatives.

Summary

In sum, not surprisingly, different populations of low-income Colorado households face different barriers to participation in the public and private fuel assistance programs. Aged households, who are disproportionately represented in the group of fuel assistance non-participants, primarily cite information problems. The different programs set out above use different delivery mechanisms and reach different populations, to account for these differences.

INTRODUCTION

Colorado's utility assistance needs today are addressed and/or funded by a patchwork quilt of agencies and programs including churches, non-profit community service agencies, and a variety of other public and private agencies. The largest of these organizations is LIHEAP, the federal fuel assistance program which assists thousands of low-income Colorado residents with their heating bills every year.³ Until recently, LIHEAP operates during Colorado's six coldest months (November through April). Because of deep federal funding cutbacks, however, the program operates only through February.

Although the need for energy assistance continues to grow, federal funds for LIHEAP has been cut by 1/3, from approximately \$33 million to \$22 million, and there is an anticipated additional 40 percent cut for Fiscal Year 1996. It is, as a result, imperative that current and new assistance avenues be investigated in an attempt to address the energy assistance needs of low-income Colorado residents in the future.

LIHEAP funds have been supplemented by donations raised by the Colorado Energy Assistance Foundation (CEAF) since 1989. CEAF, a non-profit organization governed by gubernatorial appointments to the Colorado Commission on Low-Income Energy Assistance (CCLEA), provides between 10 and 25 percent of the energy assistance benefits distributed through LIHEAP. However, CEAF's monies cannot completely fill the gap between the known need and the declining government funds.

In addition, church-supported agencies such as Catholic Charities and Metro CareRing, as well as Public Service Company and other utilities, help in meeting the assistance needs of low-income Colorado residents, especially during the months LIHEAP funds are not

3. In Colorado, this program is known as LEAP, the Low-income Energy Assistance Program. Throughout this report, federal fuel assistance will be referred to as LIHEAP.

distributed. Some of these organizations limit their assistance by geographic location, household income, immediate need and amount of arrears. Primary winter heating help, however, is provided by LIHEAP.

Beyond those Colorado residents who receive assistance, there is a population of low-income people who are *not* receiving such assistance. This may be due to any number of reasons including a lack of knowledge about available assistance or the feeling that applying for help carries a stigma. These people may be suffering shutoffs of service, facing a dilemma on whether to buy food, or pay rent, or pay their utility bill, or be threatened by illnesses due to a lack of adequate heat.

In light of these observations, the goal of this project is to increase the efficiency and effectiveness of efforts to address the needs of low-income households in Colorado in meeting the annual cost of their home energy needs (including electric, propane, natural gas, coal and wood). The project is to examine how assistance can be most effectively provided through public/private partnerships. The project objective is to design a more efficient and effective utility assistance program which would result in:

- o low program administrative costs;
- o delivery of assistance to low-income households as needed;
- o annual or year-round assistance; and
- o assistance provided through public/private partnerships.

In pursuit of this goal, the report below undertakes to accomplish five tasks, including:

- o To provide an overview of poverty in Colorado and of the low-income population;
- o To assess the energy needs of that low-income population in Colorado;⁴
- o To review the major existing public and private sources of energy assistance *currently* available in Colorado;
- o To review ongoing innovations in the delivery of fuel assistance in other states in an effort to assess potential *future* means of delivering energy assistance; and

4. This will be limited to financial needs. For the reasons outlined in the text of the report below, it explicitly excludes weatherization needs.

- o To develop and recommend sources of revenue to underwrite the costs of the proposed programs.

Recommendations regarding proposed programs and sources of revenue will, however, be brief in this report. This report is to be considered a tool for a Task Force on Low-Income Energy Assistance to be convened by the Governor. The program recommendations and sources of funding will ultimately be the responsibility of that BRC to develop and endorse.⁵

The ultimate purpose of this study, therefore, is to assist the Task Force to design programs, including cost analysis and financing recommendations in order to better address the annual home energy needs of low-income households in Colorado.

5. This report will be supplemented by occasional papers on funding sources to be developed at the request and under the direction of the BRC.

CHAPTER 1: POVERTY IN COLORADO

Answering very simple questions about poverty in Colorado is actually quite a complex task. And, unfortunately, having appropriate answers is crucial to the design and funding of energy assistance in the state. Questions such as "how many poor people are there?" and "where do they live" involve more than developing a single number.

THE NUMBER OF POOR PEOPLE IN COLORADO

Implicit in any determination of how many poor households live in Colorado is the subsidiary determination of what constitutes "being poor." A common perception is that only households who live at or below 100 percent of the federal Poverty Level are "poor." The Poverty Level, however, as is described in detail in Appendix E to this report, is *not* an appropriate measure of low-income status.

There are three approaches commonly used to measure "being poor" in America:

- o The first looks simply at income. Households with annual incomes of at or below \$15,000 are often considered to be "poor."
- o A second looks at income in relation to household size, the Poverty Level. This measure recognizes, in other words, that a three person household with an annual income of \$6,000 is, in fact, "poorer" than a two person household with an annual income of \$6,000. The federal government establishes a uniform "poverty level" for the 48 contiguous states. Since 100 percent of Poverty Level is generally considered to be too low to be reasonable, however, other estimates of the limits of "being poor" range from 150 to 200 percent of Poverty. Even different federal assistance programs have eligibility guidelines tied to different levels of Poverty.

- o A third indicator of low-income status is tied to local median incomes rather than to a national average. This local measure takes into account local conditions (including the cost-of-living implicit within area incomes) rather than looking only at the national average used in the Poverty Level. A two person household with an annual income of \$6,000 living in Colorado, for example, may be "poorer" than a two person household with an annual income of \$6,000 in North Dakota. While these households would be at the same Poverty Level, however, assuming that incomes track cost-of-living to some extent, they would be at different levels of local median income.

The Need to be Careful

Before looking at specific Colorado numbers, however, it is important to identify certain factors that must carefully be considered in looking at poverty in any particular state.

- o First, the extent of poverty in Colorado is considerable, with no county escaping its effects. Nonetheless, poverty in Colorado can be very location-specific, with some counties in the state having greater numbers of poor people than the statewide average.
- o Second, the discussion of numbers of households who are "low-income" concerns households who are at or below certain income levels. It is important to remember in such a discussion, however, that those income levels represent the *ceiling* of "low-income." For example, most persons who live at or below 150 percent of Poverty live *below*, rather than *at*, that ceiling.
- o It is important to be precise in defining what population is being considered when discussing poverty. If numbers seem to be widely divergent, it is possible that one figure refers to persons while another refers to households. Moreover, it is important to remember that "families" and "households" are not the same. The term "family" is more restrictive, and encompasses fewer persons, than does the term "household."⁶ Median household income and median family income, for example, are very different numbers.

In general, the choice of standards to use can make a substantial difference both in defining the number of households who are "poor" in any particular county, and in defining the average incomes that those households have to meet basic living expenses. With these observations, we turn then to a quantification of poverty in Colorado.

6. A "family" is a grouping of related individuals. A "household" is a single economic unit, which may include unrelated individuals.

Households at or Below \$15,000 Annual Income

Colorado has almost 300,000 households with incomes at or below \$15,000 per year. As mentioned above, however, it is important not to lose sight of the "or below" aspect of this statistic. Of these households, nearly one-quarter live with annual incomes of at or below \$5,000. Table A-1 sets forth a county-by-county distribution of the incomes of Colorado households using this definition of "poverty."⁷

Households at Different Levels of the Federal Poverty Level

The choice of what percentage of Poverty Level is to be considered "low-income" will make a difference of hundreds of thousands of households in Colorado. There are, in other words, "only" 150,000 households in the state who live at or below 100 percent of the federal Poverty Level, while there are roughly 370,000 households who live at or below 200 percent of Poverty. Roughly 253,000 households live at or below 150 percent of Poverty.⁸

In deciding the level of Poverty at which a household should be considered "poor," one must take care not to impute federal budget constraints into the analysis. Many federal programs, in other words, have eligibility levels set at 150 percent of Poverty. This income criterion, however, has little to do with the adequacy of income for the household and everything to do with controlling costs to the federal government.

Consistent with the discussion above, it is important, as well, not to assume that households who are at or below a certain Poverty Level are *at* the ceiling. Table A-2 sets forth a county-by-county distribution of *persons* --a distribution by number of households is not available-- at different levels of Poverty in Colorado.⁹ Of the 250,000 households who live at or below 150 percent of Poverty in Colorado, in other words, nearly 150,000 live at or below 100 percent.

While another analysis of Colorado's low-income population provides somewhat different numbers, the basic conclusions remain the same. Table A-3 presents an analysis using

7. All Tables are set forth at the end of this report.

8. In fact, the data reported in the U.S. Census reports persons "below" 100 percent of Poverty (*i.e.*, 0-99%), "below" 150 percent (*i.e.*, 0-149%) and the like. While there is probably a small difference between the data "at or below" and the data "below," there nonetheless will still be *some* difference and people should be aware of that difference.

9. The number of persons at each level of Poverty was converted into an estimated number of households by dividing by the average number of persons per household for each County. The assumption that household size is the same at all levels of Poverty was made simply because of data limitations.

Census data of the breakdown of Colorado households by Poverty Level and household size.

Households at Different Levels of HUD Adjusted Median Income

The U.S. Department of Housing and Urban Development (HUD) prepares and updates on an annual basis both a "Low Income" and a "Very Low Income" eligibility standard for use in conjunction with the projects it sponsors.¹⁰ Both of these standards are calculated on a county-by-county basis and are revised annually.

- o **The HUD "Very Low-Income Limit"**: The "very low-income standard" refers to all households in a county who live at or below 50 percent of the county's median income.¹¹
- o **The HUD "Lower Income Limit"**: The "low-income standard" refers to all households who live above 50 percent of the county median income, but at or below 80 percent.¹²

HUD can decide to increase the incomes eligible to qualify as either "low-income" or "very low-income" if specified local conditions, such as unusual area income levels, prevailing construction costs, fair market rents, and the like justify such a variation.¹³

Table A-4 sets forth a county-by-county distribution of households at different levels of HUD-adjusted median family income (HAMFI) in Colorado. As the Table shows, there are roughly 290,000 households who live at or below 50 percent of median income and roughly 520,000 who live at or below 80 percent of median income.

Moreover, this Table shows the extent to which low-income households tend to be tenants more than homeowners. While, for example, more than 180,000 households at or below 50 percent of HUD-adjusted median income are tenants, only 106,000 of those households are homeowners.

Summary

10. See e.g., 24 **C.F.R.** §91.5 (1992).

11. "Very low-income" is a term-of-art established by HUD. It has a defined meaning. See, 24 **C.F.R.** §91.5 (1994).

12. "Lower income" is a term-of-art established by HUD. It has a defined meaning. See, 24 **C.F.R.** §91.5 (1994).

13. 24 **C.F.R.** §91.5 (1994).

Making a determination of how many poor people live in Colorado depends in large degree upon how one defines what it means to "be poor." Estimates of Colorado's low-income population can range from 250,000 to more than 500,000 households.

Even within these ranges, however, it is important to remember that people do not live *at* the ceiling of the definition. The lowest reaches of the "or below" part of the phrase "at or below" encompasses a substantial number of Colorado households.

WHO ARE THE POOR OF COLORADO

Colorado's low-income population includes significant numbers of female-headed households, elderly, and households with very young children.¹⁴

Women in Poverty

The data does not support the "conventional wisdom" that most poor households are female-headed households with children. Indeed, in general, female adults are not overrepresented in the population at or below 100 percent of Poverty in Colorado.¹⁵ As Table A-5 indicates, women represent 58.2 percent of the entire adult population (aged 18 and older) in Colorado, while they represent only 57.8 percent of the adult population living at or below 100 percent of the federal Poverty Level.

This is not to say, however, that poverty is not a greater threat to women than it is to men. Table A-6 presents a comparison of the adult population aged 65 and older who live at or below 100 percent of Poverty. As this Table shows, nearly three-quarters of all persons aged 65 and older who live at or below 100 percent of Poverty are women. Indeed, of the 150,000 women overall who live at or below 100 percent of Poverty, nearly one-in-five are aged 65 and older.

Children in Poverty

Colorado's low-income population *does* include a substantial number of very young children. Statewide, nearly 20 percent of the persons who live at or below 100 percent of Poverty are children aged five and younger. As Table A-7 shows, this distribution of low-income children is consistent throughout the state. Looked at conversely, 15 percent of the children (at or below 17 years old) in Colorado live at or below the federal Poverty Level.

Elderly in Poverty

14. In considering the significance of these sub-populations, one should examine the program and funding implications through, for example, Title IV-A and the state PTC programs discussed below.

15. Data on poverty by gender is reported only for 100 percent of the federal Poverty Level.

At the other end of the spectrum, roughly 10 percent of all poverty-aged persons are aged 65 and older. As Table A-8 shows, the geographic distribution of older persons living at or below 100 percent of Poverty has some substantial variation. While only six percent of the older persons in Alamosa and El Paso counties live below Poverty, for example, more than 20 percent of the older persons in Baca, Kit Carson and Phillips counties do.

Summary

There are certain identifiable populations of persons who are threatened by poverty in Colorado. Some of those populations are older women, children under age five, and the elderly.

WHERE ARE THE POOR IN COLORADO

While the low-income population of Colorado represents roughly 20 percent of the entire state's population, the distribution of low-income households is much different. Tables A-9 and A-10 present the distribution of poverty within the state, with the counties having the highest concentration of low-income households listed first. Table A-9 looks at the number and percentage of households with incomes at or below \$15,000 per year. Table A-10 presents data on the number and percentage of households who live at or below 150 percent of the federal Poverty Level.

As can be seen, many of the rural counties in Colorado have a high percentage of total households who would be considered "poor" by any definition. 24 of Colorado's counties have one-in-three (or more) of their households who live at or below 150 percent of the Poverty Level, while eight counties have two-in-five households at that level. Pueblo is the largest county with a much higher than average poverty rate, at 31 percent. Other large counties (*e.g.*, Denver, Larimer, El Paso, Boulder) approach the statewide average poverty rate of 20 percent.

CHAPTER 2: FEDERAL FUEL ASSISTANCE IN COLORADO

The primary fuel assistance program in Colorado is the federally-funded Low Income Home Energy Assistance Program (LIHEAP). Through LIHEAP, the state provides basic cash grants to income-eligible households to cover home heating bills. Colorado has adopted an approach to targeting energy assistance based on home heating burdens. Colorado's approach is summarized in the LIHEAP FY 1995 State Plan. According to that document, the determination of benefits occurs through a several-step process.

- o First, the household's poverty level is calculated, with total income divided by the applicable poverty level index.
- o Second, a household contribution is determined, with those contributions being based on the following matrix: (a) 0-20% of Poverty: 1% of income; (b) 21-60% of Poverty: 2% of income; (c) 61-100% of Poverty: 3% of income; and (d) 101-150% of Poverty: 4% of income.
- o Third, a heating bill is estimated for each household. The estimate consists of the total actual home heating costs for the previous heating season, defined in Colorado to last from November 1st through April 30th of the prior year's heating season.
- o Finally, a benefit amount is calculated by subtracting the household contribution from the household's estimated home heating costs. Payment of the benefit, however, is not made dependent on the household making the calculated household contribution toward heating costs.

Under this approach, for example, a household with a heating bill of \$500, living at 100 percent of the federal Poverty Level, with an annual income of \$6,000, would receive a benefit of \$320 ($\$500 - [.03 \times \$6000] = \320).

In its essence, Colorado directly measures the energy burdens which each of its LIHEAP recipients bears in a particular year.¹⁶ The state then commits to buy down that heating burden to a designated percentage of income. If a household, in other words, has a higher energy burden relative to income, irrespective of the reason --whether lower income, the use of higher cost fuel, the maintenance of a larger family, the ownership/rental of a less efficient homes-- the LIHEAP benefit targets additional benefits to that household.

THE MOST RECENT YEAR: FY 1995

During the most recently completed Fiscal Year (FY 1995), LIHEAP provided basic cash fuel assistance to 61,226 households through June 1, 1995. Average grants in FY 1995 were \$252. The greatest portion of these basic cash benefits went to the poorest households in the state. As Table B-1 shows,¹⁷ more than 10,000 Colorado households (10,1886) with incomes less than \$4,000 were served by LIHEAP in FY 1995, and more than 24,000 households (24,180) with incomes less than \$6,000 were served. Of Colorado's 61,226 LIHEAP recipients overall in FY 1995, only 4,218 had incomes of \$15,000 or more.

Despite these numbers, LIHEAP still fell far short of serving the low-income population of Colorado. Roughly 253,000 Colorado households live at or below LIHEAP's 1995 eligibility standard of 150 percent of the federal Poverty Level. LIHEAP provided basic cash assistance to only 61,226 of those households, or roughly 24 percent. Table B-2 sets forth a county-by-county comparison of the number of LIHEAP-eligible households versus the number of households actually receiving LIHEAP benefits.

In addition to serving but a fraction of the number of households, LIHEAP covers but a fraction of the home heating bills even for those who *do* receive assistance. Statewide, the average basic cash benefit of \$252 paid only 54 percent of the average home heating bill (\$465) of LIHEAP recipients.¹⁸ Table B-3 sets forth a county-by-county comparison of home heating bills and LIHEAP benefit amounts.

16. Despite this commitment to buying down the household's heating bill to an affordable percentage of income, there is an administrative simplicity to the Colorado approach as well. At the time of the household's LIHEAP application, the LIHEAP agency obtains the household's heating bill from the preceding year from the local utility. This heating bill is then used for the calculation of the *current* year's LIHEAP benefit. Even if the current year happens to be warmer or colder, or if the household's consumption changes for some other reason, the heating bill used in the calculation of the LIHEAP benefit is not adjusted.

17. All Tables are presented in the Appendices.

18. In addition, as noted elsewhere, the average low-income home heating bill is less than 40 percent of the average low-income *total* home energy bill.

THE HISTORY OF LIHEAP FUNDING IN COLORADO

LIHEAP has never been adequately funded on a national basis, and those inadequate federal budgets have translated directly into inadequate funding at the state level in Colorado. In addition, given even further reductions in federal LIHEAP dollars in recent years, Colorado has seen a steady erosion in its ability to serve low-income households.

Table B-4 shows the reduction in federal funding provided through the federal government. While Colorado's LIHEAP program received roughly \$33.3 million in Fiscal Years 1984 and 1985, by Fiscal Year 1995, that federal appropriation had fallen to only \$20.7 million.

Indeed, as can be seen, without the intervention of the Colorado Energy Assistance Foundation (CEAF) starting in FY 1992, the significant program cutbacks (and benefit reductions) finally seen in FY 1996 would have been evident years earlier. As Table B-5 shows, even CEAF's supplemental funding has merely held Colorado's LIHEAP efforts harmless against federal budget cutbacks rather than allowing progress to be made, either in increasing the number of households served or in providing more adequate benefits. Table B-5 shows that with CEAF's supplemental funds, Colorado is providing the same level of benefits, albeit to fewer households, that it did in FY 1987.

Colorado's LIHEAP agency has undertaken to stretch its resources when faced with a shrinking budget. Table B-6 shows that the state's transfer of LIHEAP dollars to other block grant programs was substantially reduced and finally eliminated. Even the transfer to long-term energy affordability strategies such as weatherization have been significantly reduced. Moreover, as this Table shows, Colorado's LIHEAP agency has succeeded in reducing administrative costs to match its shrinking budget, even though it costs no fewer dollars to provide a benefit check of \$250 than it does to provide a benefit check of \$350.

THE CURRENT STATUS OF LIHEAP FUNDING IN COLORADO

As part of the federal budget impasse in the fall of 1995, Congress failed to appropriate funding to continue the LIHEAP program. Under Presidential order, however, a limited amount of funds was released nationally for states to operate the program. Not surprisingly, the Colorado program was virtually emasculated. Among the most significant cutbacks were:

What Was: 1994 - 1995

LIHEAP application period was from November 1, 1994 through April 30, 1995.

Income limits were set at 150 percent of the federal Poverty Level.

Child care costs, up to the State prescribed maximums, were allowed as a deduction from the gross employment income.

Crisis Intervention Program: CIP-Fuel allowed a portion of the heat benefit to be diverted to pay for an electric shut-off when the heat *source* was something other than electricity, such as natural gas. The electricity in this case was known as the supportive fuel and was needed to run the fans, blowers, thermostats, etc. for the furnace system.

What Is: 1995 - 1996

LIHEAP application period is from November 1, 1995 through February 29, 1996.

Income limits are now set at 115 percent of the federal Poverty Level.

No deduction is permitted for child care expenses.

No CIP-Fuel. LIHEAP is unable to divert a portion of the heat benefit to pay an electric shut-off when electricity is the supportive fuel. Applicants will not be able to receive help with an electric shut-off unless electricity is the heat *source* (all electric residence). Since there is no longer a CIP-Fuel program, clients will no longer be able to apply for CIP-Fuel emergency assistance at all. Emergency assistance is limited to furnace repairs and the like.

As can be seen, the federal reduction in fuel assistance for FY 1996 will have four major impacts in Colorado:

- (1) It substantially reduces the eligible population (from 150% to 115% of the federal Poverty Level);
- (2) It eliminates the program altogether during a substantial part of the winter (for bills to pay for usage in February, March and April);
- (3) It eliminates important crisis protections (for households who cannot operate a natural gas furnace because the electricity necessary to operate the furnace

fan and thermostat has been disconnected); and

- (4) It disproportionately affects the working poor (by eliminating child care deductions).

CHAPTER 3: OTHER ENERGY-RELATED PUBLIC ASSISTANCE IN COLORADO

One issue for Colorado to consider is the extent to which public assistance is available to help pay for low-income energy bills if funds now available through the federal Low-Income Home Energy Assistance Program (LIHEAP) are eliminated or severely curtailed. This review looks at the availability of public funds. Public funds in Colorado, other than through LIHEAP, are *extremely* limited.

Before looking at public *financial* assistance, this Chapter will first briefly consider the non-financial assistance provided through regulations of the state Public Utilities Commission and similar initiatives.

60-DAY HOLD PROVISION ASSOCIATED WITH LIHEAP ASSISTANCE

One of the primary forms of non-financial assistance provided to low-income households in Colorado involves the 60-day hold provision contained in the vendor contracts between the state LIHEAP office and the state's public utilities. Colorado's home energy vendors must sign the vendor contract in order to receive the LIHEAP benefit as a direct payment to the vendor to be applied against the household's energy bill. Without such a signed contract, the LIHEAP benefit is paid in cash to the household, which then can be used for purposes other than payment of home energy bills.

The 60-day hold provision applies to any household who has applied for energy assistance and for whom the utility has been notified by the county LIHEAP office that payment will be made to the company on the household's behalf. Under the "hold provision," once a utility has been notified that a household has been approved for a LIHEAP payment, that company must:

- o initiate service, continue service, or restore service, whichever is applicable;
- o not terminate service for at least sixty days after such notification; and
- o make a "good faith effort" to establish (or re-establish) an installment or modified budget billing arrangement if the household is in an actual or potential shutoff situation at any time during the sixty day period.

The provisions relating to the initiation, continuation, restoration, or non-termination of service are applicable:

regardless of the amount of the household's arrearage, the amount of the [LIHEAP] benefit, or the household's payment history, including the household's failure to abide by an earlier payment agreement. The [utility] may not refuse to restore service to an eligible household because there is an arrearage or a broken payment agreement.

Moreover, according to the vendor agreement with the LIHEAP office, the utility will not terminate utility services for a LIHEAP recipient *more* than sixty days after the notification (and throughout the time the household remains eligible for LIHEAP) unless the household either:

- o fails to enter into an installment or modified budget billing payment plan with the company; or
- o fails to make the required payments under an installment or modified budget billing plan (or any other payment plan) negotiated with the utility.

A considerable number of LIHEAP recipients in Colorado do not benefit by the 60-day hold provision serving as a *de facto* winter shutoff moratorium. Assuming that the notification of a LIHEAP applicant's approval and the date of approval are roughly the same, to maximize the use of the 60-day hold, an applicant would seek approval at a time where the 60 days would run throughout the cold weather months. A household whose notice of approval was provided on December 1st, in other words, would receive its 60 days of protection during the months of December and January. In contrast, the household whose notice of approval was provided on March 1st would receive its 60 days of protection during the months of March and April.

As can be seen below, of the 61,000 LIHEAP applicants who were approved in the 1994 - 1995 program year, more than one-quarter (27 percent) were approved on or *before* December 1st and nearly one-sixth (17 percent) were approved on or after March 2nd. These LIHEAP recipients, therefore, received their 60 days of protection during times other than the coldest winter months. This is particularly important when one realizes, of course,

that the December heating *usage* shows up as the January heating *bill*. The bills which are most likely to be unaffordable are thus the January, February and March bills (reflecting December, January and February usage).

{PRIVATE }Number and Percent of Approved LIHEAP Applications by Month: Colorado, FY 1995				
Time Period	Approved This Month		Cumulative By Last Date of Period	
	No. During this Month	Pct During this Month	Total Approved Applications	Percent of June Total
Before November 3	5,391	9%	5,391	9%
Nov 4 - Dec 1st	11,101	18%	16,492	27%
Dec 2 - Jan 5th	14,571	24%	31,063	51%
Jan 6 - Feb 3rd	11,380	19%	42,443	69%
Feb 4 - Mar 2nd	8,254	13%	50,697	83%
Mar 3 - Apr 6th	6,830	11%	57,527	94%
Apr 7 - May 4th	2,812	5%	60,339	99%
May 5 - Jun 1st	887	1%	61,226	100%

COLORADO PUBLIC UTILITY COMMISSION SHUTOFF REGULATIONS

In addition to LIHEAP's 60-day hold provisions, the Colorado Public Utility Commission has promulgated regulations that offer shutoff protections for customers facing an inability-to-pay. While contained in different parts of the Colorado administrative code, regulations governing the disconnection of service by gas and electric are identical.¹⁹

The Colorado PUC's regulations impose the following restrictions, amongst others, on the disconnection of service to residential customers:²⁰

- o Terminations are prohibited without the utility first providing written

19. Electric shutoff regulations are found at 4 Code of Colorado Regulations (CCR) § 723-3; natural gas shutoff regulations are found at 4 CCR § 723-4.

20. This listing is not intended to be comprehensive, but is rather intended to be a summary of the major protections for low-income payment-troubled customers.

notice mailed by first class mail, or delivered at least ten days in advance of the proposed termination date;

- o Terminations are prohibited during any period when the termination of service would be especially dangerous to the health or safety of the residential customer (or a permanent resident of the customer's household) *and* the customer establishes that he or she is unable to pay for the service as regularly billed by the utility, or is able to pay for such service but only in reasonable installments;²¹
- o Terminations are prohibited if current bills are paid when due and past due bills are being amortized by reasonable installment payments. A "reasonable installment payment" is defined to mean an installment that pays off at least one-sixth of the past due amount and is made no less frequently than once a month.

In addition, the PUC's regulations require that all utilities provide each new residential customer (and provide on each shutoff notice) a list of "major federal, state or local government agencies, known to the utility, which provide customer assistance or benefits relating to utility service." Finally, the regulations require that all utilities provide "to any customer, on written or telephonic request, a list of all organizations and agencies, public and private, known to the utility, which provide consumer assistance or benefits relating to utility service."

Other PUC protections relate to the provision of third party notices, to restrictions on shutoffs on certain days of the week, on the nature and content of notices, and on the rights to hearings.

FEDERAL EMERGENCY MANAGEMENT ACT (FEMA)

One federal crisis program which is used as a source for energy related crises in Colorado involves FEMA, the Federal Emergency Management Act. While available, however, FEMA dollars account for a very small portion of fuel assistance dollars. For each of the last three years, FEMA dollars have accounted for roughly \$110,000 in assistance to respond to utility emergencies. Importantly, however, while the dollars have stayed relatively constant over the three year period, the number of households assisted has increased by more than 250 percent, going from roughly 1,300 in 1993 to almost 3,400 in 1995. As a result, the average FEMA

21. The regulations provide that a termination of service would be especially dangerous to the health or safety of the residential customer (or resident of the customer's household) if it would aggravate an existing medical condition or create a medical emergency for the customer or resident as certified in writing by a licensed physician.

emergency utility grant has dropped from \$84 in 1993 to only \$32 in 1995.

Table C-1 provides the amount of FEMA dollars available in Colorado for the past three funding periods disaggregated by local jurisdiction distributing FEMA dollars. While other funds are available throughout the State, the bulk of Colorado's dollars are distributed in the City and County of Denver. Other local jurisdictions that have significant amounts of FEMA dollars (relative to other local jurisdictions) include Arapahoe County (\$15,268) Boulder County (\$8,936), Jefferson County (\$10,700) and Pueblo County (\$7,000).

As with many such programs, however, FEMA is facing significant federal budget cutbacks. While the financial future of FEMA is uncertain as of the date of this writing, even the limited assistance discussed above appears to be in jeopardy.

THE PTC PROGRAM

One of Colorado's major public benefit programs that has a "heating" component to it is the program providing a property tax/rent/heat rebate on Colorado income taxes. In tax year 1994, this program, commonly referred to as the "PTC" program, was available to any Colorado resident who was:

- o at least 65 years old, or²²
- o a surviving spouse at least 58 years old, or
- o a person who was disabled for the entire tax year, regardless of age.²³

In addition to these eligibility criteria,²⁴ Colorado residents must meet income criteria to qualify for the PTC. A single person must have income less than \$7,500 for the year while a married couple must have income of less than \$11,200.²⁵ In addition, no person may claim the credit if they were claimed as a dependent on the

22. For married couples, only one partner need be age 65 or older to qualify.

23. A person is "disabled" if they are "unable to engage in any substantial gainful activity for medical reasons." In addition, the person must have received disability benefits from a bona fide public or private plan based solely on such disability.

24. Thus, for example, an AFDC recipient does not qualify for the rebate unless he or she also meets the age or disability requirements.

25. The income eligibility guidelines were established by statute when the law was first enacted in 1987. *See*, C.R.S.A., §§ 39-31-101(3)(b) and 39-31-104(3)(b) (1995).

state or federal tax returns of another person.²⁶

Through the PTC program, a person may receive a credit on their property tax or rent up to a maximum of \$500. In addition, a person may receive a credit for their heating bills "actually paid" up to a maximum of \$160.²⁷ The actual benefit is based on a formula. The full maximum credit is received by single persons with incomes of up to \$5,000 or by married couples with joint incomes of up to \$8,700. If the households have incomes over these amounts, the rental/property tax credit is reduced by 20 percent of each dollar of income over the limit; the heating credit is reduced by 6.4 percent (6.4%) for each dollar over the limit.

A household must apply for the PTC credit. Households have two years to apply for the credit available in any given tax year. Thus, for example, the 1994 rebate may be claimed up to or on December 31, 1996. The 1993 rebate may still be claimed up to or on December 31, 1995.

The benefits provided through the PTC program have been decreasing in recent years. During the 12-month period ending May 30, 1995, for example, the state had received 31,864 claims, down 4.8 percent from the previous year (33,484). During that same time period, the state disbursed \$11,257,773 in rebates, down seven percent from the previous year. The average refund during the 12-month time period ending May 30, 1995 was \$352.²⁸

GENERAL ASSISTANCE

General Assistance distributed by county Departments of Social Service (DSS) is quite limited in Colorado. Moreover, even those counties who distribute General Assistance benefits do not generally make available funds for energy emergencies. County DSS agencies were asked whether they distribute General Assistance dollars, and if so, to what extent (if at all) those funds were used for energy grants. Of the 46 counties responding to the request for information:

- o 21 said they did not distribute *any* General Assistance funds; and
- o Of the 25 who said they distributed some General Assistance, only ten said they used General Assistance for energy emergencies (while 15

26. For example, a disabled child who is claimed as a dependent does not qualify for the credit.

27. If heating is paid as a part of rent, it is assumed that 10 percent of the rent is for heat.

28. The state does not separately track how much of a credit is provided for heating and for property tax/rent. Only consolidated figures can thus be provided.

said they would not use General Assistance for energy emergencies). Indeed, many of the counties who reported using no General Assistance specifically cited the availability of LIHEAP as the reason for their refusal to provide energy dollars through General Assistance.²⁹

In total, the counties who reported using General Assistance for energy emergencies distributed a total of less than \$4,500 (\$1,500 of which came from one county).

TITLE IV-A EMERGENCY ASSISTANCE GRANTS: CEAF

One of the biggest sources of non-LIHEAP dollars made available in Colorado involves the leveraged resources provided through AFDC's Title IV-A program in cooperation with CEAF. In December, 1994, the Colorado LIHEAP office and CEAF entered into an agreement that provided for a contribution of \$2.0 million from CEAF that was expected to result in an additional \$2 million in federal Emergency Assistance Program (EAP) funds from the federal government. CEAF and LIHEAP agreed further that any CEAF monies not spent to leverage the Title IV-A funds would supplement regular LIHEAP benefits.

UTILITY COMPONENT OF COLORADO'S AFDC PAYMENTS

While the Colorado AFDC program does not provide a specific component to cover utility bills within its basic grant, a recipient can *lose* AFDC benefits if that person is not responsible for paying his or her own utility bills. According to a staffperson for the state AFDC agency, Colorado operates a consolidated grant program where no specific component of the grant is assigned to food, shelter, utilities and the like. Colorado calculates a standard of need for AFDC recipients and then pays 84.75 percent of that standard.

Despite this consolidated grant approach, the state will reduce the household's AFDC grant by seven percent (7%) if the recipient is not responsible for paying their own utility bills.³⁰ The reduction involves a flat percentage, although the dollar amount varies given the difference in AFDC benefits based on household size. According to the AFDC office, the state could extract the number of AFDC recipients for whom there was a reduction in AFDC benefits due to this utility set-off, but the state does not normally track and record the extent of the reduction. "Very few" such reductions occur, the AFDC office said.

29. In Colorado, of course, LIHEAP is distributed through the County DSS agencies, so the same agencies that distribute LIHEAP distribute General Assistance.

30. An example of the lack of responsibility might be that a mother and her kids live with the grandparents and bears no responsibility for paying home utility bills.

Using this seven percent setoff as the basis for determining how much of the AFDC benefit is intended as "energy assistance," it is possible to calculate a rough estimate of the amount of energy assistance provided through AFDC. The average number of AFDC families in Colorado in 199 was 43,000 per month while the average benefit was \$322.³¹ Given this data, the annual fuel assistance provided through AFDC would reach roughly \$11.6 million ($\$322/\text{mo} \times 12 \text{ months} \times .07 \times 43,000 \text{ families} = \11.630 million).³²

PUBLIC AND ASSISTED HOUSING

Utility allowances provided through public and assisted housing programs comprise an additional major source of dollars to help low-income households pay home energy bills. The primary public and assisted housing programs public housing owned by local Housing Authorities and Section 8 assisted housing. In Colorado, there were 52 public housing programs and 44 Section 8 programs through the end of 1994. According to data published by the National Association of Housing and Redevelopment Officials (NAHRO), the industry association of housing authority administrators amongst others, Colorado had more than 32,000 public and assisted housing units in 1994. For purposes of this discussion, public housing units will be set aside and assisted housing will be the focus.³³

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31. Committee on Ways and Means, House of Representatives, *1994 Green Book: Overview of Entitlement Programs*, at 391, 396 (July 1994).
 32. An alternative estimate would multiply the total AFDC benefits in Colorado (\$164 million) by seven percent. This yields a total of \$11.5 million.
 33. More often than not, public housing involves master metered consumption, with "utility allowances" being provided in terms of units of energy. Public housing residents are then charged if their consumption, as measured by "check-meters," exceeds their designated utility allowance. In contrast, the "utility allowance" provided to tenants of assisted housing is in dollars as described below.
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{PRIVATE }Public and Assisted Housing Units in Colorado: 1994	
Public Housing /a/	8,950
Section 8 Certificates /b/	11,640
Section 8 Vouchers /c/	5,614
Other Assisted Housing /d/	6,060
Total	32,264
NOTES:	
/a/ Public housing is housing actually owned by the government, generally through local public housing authorities (PHAs).	
/b/ Section 8 certificates involve units of housing which are designated as low-income housing. The units receive housing subsidies irrespective of who in particular lives in them.	
/c/ Section 8 vouchers involve households who receive housing subsidies. These households receive vouchers which they can then use to assist in paying rent in market-based housing. Households receiving vouchers, in other words, need not live in "Section 8 housing."	
/d/ A variety of other housing programs by the federal government require that the units be kept "affordable." These units are provided with housing subsidies even though they are not "Section 8" housing.	

While the numbers of households being served through public and assisted housing are less than the numbers of households being served through the federal fuel assistance program, the *dollars* involved are cumulatively equal. On a per household basis, utility allowance grants provide substantially greater assistance than LIHEAP. While state-specific data is not available on the average utility allowance in Colorado, nationwide, the average *monthly* utility allowance for Section 8 households was \$64 in 1991. Applying that figure to the 23,000+ assisted housing units (Section 8 plus "other") yields an annual average flow of utility assistance of nearly \$18 million to Colorado assisted housing residents.

A Description of the Utility Allowance Program

The purpose of providing affordable housing is served through the provision of rental subsidies and a "utility allowance." Under Section 8, a property owner is

permitted to set a rent not to exceed a HUD-determined "fair market rent."³⁴ A Section 8 utility allowance is provided that varies depending on fuel source, type of housing and the like. The utility allowance, when summed with the rental subsidy, is intended to reduce the shelter costs of program participants to 30 percent of income.

The operation of this 30 percent limit can be shown by example. If a Section 8 household has an annual income of \$4,000, the household will be required to pay no more than 30 percent of that income (\$1200 a year or \$100 a month) toward household shelter costs. The 30 percent limit is "enforced" in two ways. First, limits are set on the contract rent³⁵ that a landlord may charge for a Section 8 dwelling. The contract rent plus the utility allowance may not exceed the Fair Market Value for the region in question. If the shelter costs *do* exceed the fair market rent, the property is not eligible to be certified by HUD as a Section 8 unit. Given a Fair Market Rent of \$500, and an \$85 utility bill, in other words, if the landlord seeks a rent of \$430 (thus making total shelter costs \$515), the landlord may not participate in Section 8.³⁶

Second, the household is, at least presumably, held harmless against all utility bills (except telephones). Each local Public Housing Authority (PHA) is directed to develop a utility allowance such that the sum of the Section 8 tenant's uncovered utility bill and contract rent will be no more than the 30 percent limit. In fact, however, under Section 8, the rental subsidy *plus* the utility allowance are paid entirely to the landlord. According to the United States General Accounting Office

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34. "Section 8 of the United States Housing Act of 1937 (42 U.S.C. 1437f) authorizes a housing assistance program to aid lower income families in renting decent, safe, and sanitary housing. Assistance payments are limited by fair market rents (FMRs) (or payment standards based on FMRs in the Housing Voucher Program) established by HUD for different areas. In general, the FMR for an area is the amount that would be needed to rent privately owned, decent, safe, and sanitary rental housing of a modest (non-luxury) nature with suitable amenities." Section 8(c) of the Act requires the Secretary of HUD to publish FMRs "periodically, but not less frequently than annually, to be effective on October 1 of each year." 56 *Federal Register* 49024-01 (Sept. 26, 1991).
35. "Contract rent" is a defined term. "Contract rent" is defined to include "the total amount of rent specified in the Housing Assistance Payments (HAP) contract as payable to the owner by the Family, and by HUD or the PHA on the Family's behalf." 24 *C.F.R.* §813.102 (1992).
36. HUD regulations regarding its "existing housing" program define "fair market rent" as: "The rent, including utilities (except telephone), ranges and refrigerators, and all maintenance, management, and other services, which would be required to be paid in order to obtain privately owned, existing, decent, safe, and sanitary rental housing of modest (non-luxury) nature with suitable amenities." 24 *C.F.R.* §882.102 (1992). HUD regulations for "new construction" provide, pursuant to a definition of fair market rent, that "the contract rent plus any utility allowance for the unit must not exceed the Fair Market Rent in effect at the time of processing." 24 *C.F.R.* §880.204 (1992).

(GAO):

Utilities are individually metered when utility consumption is measured for each housing unit and the assisted household pays its bill directly to the utility company. Here, a utility allowance is provided as a reduction in the amount that the household would pay to equal 30 percent of adjusted income. For example, if 30 percent of a household's income is \$250 per month and the allowance for reasonable utility costs is \$100 per month, then the household pays the PHA or the Section 8 landlord \$150 per month for shelter cost and retains the \$100 to pay utility costs.³⁷

As can thus be seen, notwithstanding the utility allowance, the tenant is then merely *assumed* to devote her \$100 payment in this case to her utility payment. Moreover, the actual utility bills are merely assumed to be no more than the \$100 utility allowance.

The Inadequacy of Existing Utility Allowances

Nationwide, the utility allowances provided to Section 8 households fall seriously short of covering actual Section 8 utility bills, according to a recent study by the U.S. General Accounting Office (GAO). The households hardest hit, GAO found, involve those "households with the lowest incomes and the largest disparity between the allowance and their utility expenses* * *."³⁸ The GAO has documented the prevalent nature of the mismatch between utility allowances and actual utility costs. According to GAO:

For Section 8 households, rent burdens averaged about 36 percent of adjusted monthly income--notably different than the statutory amount. * * *[A]bout 70 percent of the Section 8 households paid more than 30 percent of their adjusted income for rent and utilities. Even more striking, 32 percent of the Section 8 households had rent burdens exceeding 40 percent of adjusted income.

On average, those Section 8 households that exceeded 30 percent of adjusted income paid about \$43 more in utility expenses than they received in allowances. The total monthly income of the Section 8

37. U.S. General Accounting Office, *Assisted Housing: Utility Allowances Often Fall Short of Actual Utility Expenses (Vol. I)* (March 1991); *Assisted Housing: Utility Allowances Often Fall Short of Actual Utility Expenses (Vol. II)* (March 1991).

38. *Id.*, at 22 - 23.

households in our review averaged \$544 (plus/minus \$24). After paying \$165 per month (36 percent of adjusted income for rent and utility expenses--the average result we obtained), Section 8 households in our review, on average, had about \$379 in disposable income remaining each month to cover other living expenses. Thus, \$43 each month for additional utility expenses represents a sizable portion of the households' disposable income.³⁹

GAO noted that "invariably, households with very low incomes and high utility allowances risk incurring greater rent burdens than households with high incomes and low allowances when expenses exceed allowances. Therefore, a household's allowance takes on a greater or lesser importance in achieving the 30-percent rent burden amount depending on its income and utility expenses."⁴⁰ As GAO explained:

For example, a hypothetical household has an adjusted monthly income of \$250, a \$10 utility allowance, and a resulting monthly rent (including the utility allowance) of \$75 ($\$250 \times 0.3 = \75). If the household's utility expenses were 50 percent more than the allowance, the rent burden would be 32 percent. However, if this same household received a \$75 allowance and again consumed 50 percent more than the allowance, the rent burden would rise to 45 percent. On the other hand, if the hypothetical household's adjusted monthly income were \$750, with the same allowance and consumption factors as cited above, the rent burden would be 31 percent with a \$10 allowance and 35 percent with a \$75 allowance.⁴¹

Section 8 households tend to be amongst the lowest income households on a utility's system. These households, nationwide, have an average annual income of less than \$5,400. For a household size of three, this income places them at roughly 50 percent of the Federal Poverty Level.⁴²

Colorado-Specific Figures

To test whether the Colorado data mirrors the nationwide phenomenon of

39. *Id.*, at 24 - 25.

40. *Id.*, at 27.

41. *Id.*, at 27 - 28.

42. 100 percent of Poverty for a family of three in 1991 was \$11,140.

inadequate utility allowances for assisted housing units, Section 8 utility allowances were obtained for a variety of Public Housing Authorities throughout Colorado. These utility allowances were annualized then compared to the annual home energy bills calculated for the county in which the Housing Authority is located. The results are set forth in Tables C-2 and C-3.⁴³

As Table C-2 shows, annual utility allowances tend to fall well short of the goal of covering low-income home energy bills in Colorado. Only San Miguel County, on average, covers the entire average annual home energy bill of low-income households (101 percent). So, too, does the Section 8 program in Archuleta County cover 90 percent of the average annual bill. At the other extreme, however, lie Mesa County and Pueblo, Commerce City, Englewood and Trinidad, each of whom covers less than half the average annual bill. The dollar shortfalls are dramatic, ranging from roughly \$100 in Archuleta County up to a common shortfall of between \$400 and \$600 per year for these low-income households.

Even if one isolates the winter heating allowance from the total energy bill, the problems with utility allowances in Colorado are just as dramatic. The winter heating allowance typically covers from roughly 40 to roughly 80 percent of the average low-income winter heating bill. Shortfalls between the Section 8 utility allowance and the average winter home heating bill typically fall in the \$100 to \$200 range for a six month period. The winter heating data is presented in Table C-3.

SUMMARY

From the perspective of public assistance to help pay low-income home energy bills in Colorado, LIHEAP is by far the major player. The extent of General Assistance is measured in thousands of dollars, while FEMA is measured in tens of thousands of dollars. While the PTC program distributed more than \$11 million in benefits to eligible residents, these funds included property tax/rent rebates along with heating rebates. The elimination or significant curtailment of LIHEAP in Colorado would leave virtually no publicly-funded assistance program to help pay low-income utility bills. Even the major public assistance program other than LIHEAP which *does* exist has major problems. Similar to this program nationwide, and contrary to statute, the utility allowances adopted for Section 8 assisted housing universally fail to pay for either home heating or home energy costs.

43. There is some mismatching in the comparisons. The energy bills are calculated for the average household, while the utility allowances vary by housing type and size. To seek to minimize the potential mismatch, utility allowances for a two bedroom single family home heated by natural gas (with gas hot water) have been chosen for comparison purposes.

CHAPTER 4: ENERGY-RELATED PRIVATE ASSISTANCE IN COLORADO

Private sources of funding provide limited but important "crisis" fuel assistance in the State of Colorado. These sources of funds are "important" in that they provide a ready place for persons dealing with low-income payment problems to refer clients for cash assistance. In addition, there is significant coverage throughout the state from these private sources of fuel assistance.

THE COLORADO ENERGY ASSISTANCE FOUNDATION (CEAF)

The Colorado Energy Assistance Foundation (CEAF) is a non-profit fundraising organization under the direction of the Colorado Commission for Low-Income Energy Assistance created by Governor Romer in 1988. In turn, in 1989, that Commission created CEAF, which was designed to bridge the gap between the growing need for heating assistance statewide and the decreasing availability of federal funds.

As a public/private partnership, CEAF's fundraising involves regulated and non-regulated energy providers, the public, and both the state and federal governments. On average, less than five percent of the money raised by CEAF has been used for the organization's administration.

CEAF awards an annual contribution to the state LIHEAP agency for winter energy assistance and approved special projects. CEAF moneys are *not* used to cover LIHEAP's administrative costs. In the 1993 - 1994 winter heating season, roughly 180,000 individuals were helped through CEAF assistance.

In addition to this winter heating assistance, CEAF has provided other types of assistance to promote affordable home energy bills. In 1994, for example, CEAF started an energy

assistance grants program to assist households from May through October, the months during which LIHEAP does not operate.⁴⁴ In 1994, the new program distributed \$75,000 through 11 Denver agencies to assist more than 700 families. In 1995, more than \$300,000 was distributed through 19 agencies helping approximately 2,000 families.

CEAF's fundraising involves legislation, customer contributions, special requests during utility refunds, company matching programs, the Combined Federal Campaign, investment and interest earnings, events, corporate contributions, and settlement agreements.

{PRIVATE }CEAF Sources of Revenue: 1992 - 1994			
Source of Revenue	FY 1992	FY 1993	FY 1994
Customer contributions	\$1,865,442	\$357,906	\$409,460
Utility company contributions	\$1,964,439	\$1,120,712	\$1,045,758
Unclaimed utility deposits and refunds	\$878,115	\$7,567,130	\$87,113
Other donations	\$0	\$16,330	\$11,915
Special events net of expenses	\$27,118	\$12,996	\$13,850
Investment income	\$202,633	\$369,297	\$252,072
Total revenue	\$4,937,749	\$9,444,371	\$1,802,168

THE STATE'S LARGEST FUEL FUNDS

In addition to the efforts of the Colorado Energy Assistance Foundation (CEAF), significant private low-income fuel assistance is provided in Colorado Springs and Weld County. The efforts in Colorado Springs revolve around the Citizens Option to Provide Energy (COPE). The efforts in Greeley are funneled through the Colorado Natural Gas Assistance Foundation operated by Greeley Gas.

44. Given the decision to reduce LIHEAP's months of operation to include only November through February, CEAF will be unable to maintain its commitment to help provide benefits during all non-LIHEAP months. CEAF's program will begin much later in the year than the closing date for LIHEAP.

Citizens Option to Provide Energy (COPE): Colorado Springs

Customers of Colorado Springs Utilities (CSU) are served by a local fuel fund called Citizens Option to provide Energy (COPE). COPE is a locally-funded program that provides additional emergency assistance to CSU customers when all other aid resources are exhausted. COPE's funding comes entirely from donations by CSU customers and employees.

COPE's distributes roughly \$90 - \$100,000 each year through five not-for-profit agencies: Ecumenical Social Ministries; Northern Churches Care; Pikes Peak Community Action Agency; Salvation Army Corps Community Center; and Silver Key Senior Services. Because CSU and the distribution agencies absorb overhead costs, 100 percent of funds go to recipients. COPE provides assistance to roughly 900 - 1,000 households per year.

Project COPE Disbursements and Households Assisted		
Year	Expenditures	Households
1989	\$89,969	973
1990	\$95,071	905
1991	\$85,304	829
1992	\$89,712	887
1993	\$108,910	1,055
1994	\$94,179	898
1995	\$92,167	800
Cumulative (1989 - 1995)	\$655,312	6,347
Cumulative (1983 - 1995)	\$784,725	9,963

According to COPE, demands for COPE assistance are highest in May through July when winter LIHEAP aid is not available. It is during that time, the agency says, when payment extensions often run out and customers are still paying off winter bills. Bad weather in the spring can exacerbate the difficulty in meeting utility payments for many elderly and low-income families.

COPE maintains strict guidelines as to who receives money. Not only must an applicant demonstrate the desire and future ability to be self-sufficient, but the applicant must also complete budget counseling before receiving assistance. In addition, CSU keeps track of

whether assistance has been solicited from other agencies; recipients cannot receive COPE aid from more than one participating agency. Finally, in keeping with COPE's emphasis on self-sufficiency, most customers only receive assistance once.⁴⁵

The Colorado Natural Gas Assistance Foundation

The Colorado Natural Gas Assistance Foundation is a Colorado non-profit organization created in 1987 to generate gas utility assistance funds for low-income Colorado residents. To that end, the Foundation created a wholly owned subsidiary, the Colorado Natural Gas Assistance Corporation, to raise funds and deliver benefits to users of natural gas. All revenue raised from the efforts of this organization are used by the Foundation for low-income energy assistance, weatherization, and energy education programs, and other projects that address the problems of poverty in the State of Colorado.⁴⁶ The activities of the Foundation have included:

- o Providing seed money for a community-based consumer credit counseling program in Greeley;
- o Developing a revolving loan program to assist utility customers in paying security deposits;
- o Developing an energy efficient furnace replacement program that also provides funds for energy audits of low-income housing.

In addition, in the early 1990s, the Foundation (through another subsidiary: the Colorado Equity Fund) began to develop low-income housing in the state of Colorado using private corporate investment dollars in conjunction with the federal low-income housing tax credit program.

The American Red Cross administers the Foundation's utility assistance programs in Weld County. Assistance programs include direct gas utility payments, security deposits for utility services, and furnace/space heater replacements. Total financial assistance to Weld County residents and non-profit social service agencies through December 1995 is approximately \$880,000. Roughly 5,000 utility customers have received direct financial assistance to date, with many more receiving indirect assistance from the Weld County United Way agencies which have received approximately \$420,000 in contributions from the Foundation. In

45. Certain circumstances may require a customer to receive more than one month's utility assistance. Illness or injury, COPE acknowledges, can be financially devastating with repercussions felt for several months.

46. Projects have addressed issues such as basic education, housing, health care and shelter of the homeless.

addition, total financial assistance in Boulder County had reached roughly \$140,000 through the end of 1995.

Several aspects of the Foundation's energy assistance efforts distinguish it from the assistance efforts through the federal LIHEAP program.

- o The Foundation's program operates year-round, while LIHEAP is directed toward the cold-weather heating months;
- o The American Red Cross represents "neutral ground" for many people. It thus represents an alternative for persons who do not wish to take "welfare" from the government.
- o The Foundation's eligibility guidelines do not require the receipt of an actual shutoff notice prior to receiving assistance so long as the household is otherwise income eligible.

The Foundation reports that its administrative expenses comprise approximately five percent of Foundation revenues.

Metro CareRing

In addition to these private fuel funds, one of the major players in providing private fuel assistance in Colorado is Metro CareRing. Over the past three years, Metro CareRing has served more than 1,100 clients, distributing roughly \$125,000 in low-income energy benefits. Even Metro CareRing, however, does not bring its own source of funding to bear on the low-income energy problem. Of the \$127,000 distributed through Metro CareRing since 1993, less than \$8,000 was provided from that organization's "own" resources. In contrast, Metro CareRing distributed more than \$66,000 in funds provided through CEAF and roughly \$53,000 in FEMA dollars. Thus, as can be seen, roughly 95 percent of the "private" fuel assistance distributed through Metro CareRing involved, in fact, public dollars.

Energy Assistance Distributed by Metro CareRing: 1993 - 1995						
	1993		1994		1995	
	Dollars	HHs	Dollars	HHs	Dollars	HHs
FEMA	\$17,600	171	\$17,600	180	\$17,248	189
CEAF	\$0	0	\$14,500	140	\$52,000	395
Metro CareRing	\$2,700	22	\$2,700	22	\$2,400	20
1993 Metro CareRing data estimated to be similar to 1994 and 1995.						

THE AVAILABILITY OF REFERRAL AGENCIES

The information developed below on private sources of fuel assistance in Colorado is not intended to be a comprehensive inventory of such sources of funds. Rather, the intent was to develop sufficient information to gain some insights into the operation of the network of private assistance providers, whether or not that network could be quantitatively evaluated as to the extent of the resources available or the amount of the met and/or unmet needs *vis a vis* the resources. The data presented below is sufficient, in other words, to gain sufficient knowledge of the dynamics of private fuel assistance to allow policymakers to make decisions as to how such agencies "fit" into the picture.

The provision of private fuel assistance in Colorado is not simply an urban phenomenon. Without addressing whether the available funds are sufficient to meet the need, it is nonetheless possible to conclude that persons dealing with rural payment problems have places to turn.

Twelve of the state's Rural Electric Cooperatives (RECs), for example, responded to a request for names of referral agencies. Only the San Luis Valley REA and Poudre Valley REA responded that they had requests for referral agencies, but had no place to send them. Other co-ops reported a range of names, addresses and phone numbers of churches, Salvation Army centers, and community agencies to whom they could refer low-income persons facing payment crises.

Rural Legal Services advocates in Colorado also reported referral agencies. Colorado Rural Legal Services (CRLS) offices in communities such as Pueblo, Alamosa, Fort Collins, Fort Morgan, La Junta and Greeley County all reported churches which they knew provided emergency fuel assistance.

Typical Benefits

The "typical benefit" from these private sources of energy assistance is very small, almost across-the-board, being in the \$50 - \$100 range. Of the 17 agencies providing private assistance, only five said they had a typical benefit of up to \$100, while three said their typical benefit was \$30 or less. Seven said their typical benefit was from \$40 to \$50.

Moreover, almost all agencies said that a household cannot get more than one grant per year. Only four of the 17 said that they would provide more than one grant, while twelve said "no" and two said they would only in extraordinary circumstances.

Geographic Restrictions

Not surprisingly, most places limit their grants to a specific geographic area. Indeed, ten of the 17 agencies providing information required the recipient to live within specified geographic boundaries.

Non-Geographic Restrictions

There is, however, a surprising lack of non-geographic restrictions on private fuel assistance in Colorado. Restrictions limiting grants to, for example, the elderly and disabled were not prevalent, with only two agencies restricting their funds to senior citizens. Virtually all said that the household seeking assistance had to demonstrate a crisis by receipt of a shutoff notice. Only one of the agencies said that it required the household to have applied for LIHEAP assistance before obtaining its private assistance.⁴⁷

Needs and Resources

The need trends are up while the resource trends are not. Of the 17 agencies responding, 13 indicated that the requests for assistance have increased in recent years. At the same time, seven agencies said that their resources were "stable" or had actually decreased.

Notwithstanding this observation, a surprising number of agencies said that their resources were "sufficient" and that they needed no additional resources to distribute. Six of the 17 agencies said their resources were sufficient. The smaller agencies providing assistance -- these are primarily the churches who simply give out what they get in-- did not provide a figure on how much more they needed each year. It appears that these institutions do not set

47. This observation may be somewhat misleading, however. FEMA *requires* that LIHEAP benefits be exhausted before FEMA benefits can be provided. In response, Metro CareRing (Denver) is the only agency that pays out FEMA dollars while LIHEAP is open each year. Other agencies wait until after LIHEAP is no longer available so that they do not have to document compliance with the LIHEAP application requirement for federal audit purposes.

goals. If they have funds, they provide assistance and if they don't, they don't. The agencies who really have identified a substantial need are those who provide substantial assistance (e.g., Metro CareRing, InterFaith Task Force).

One thing that was striking --while perhaps self-evident if one thinks about it-- is the number of private agencies who do not provide major sources of assistance to payment-troubled customers, but instead help just a few households in their respective local areas. Many of the churches, in other words, reported helping a dozen or fewer customers per year,⁴⁸ with benefits in the range of roughly \$50 per recipient.

From the survey of private funding sources, it became clear that there are many places that give out "a little" money, a few hundred dollars that help just a few families. Moreover, from the survey of private funding sources, it became clear that there are places who really *do* believe in having the local community take care of "its own." This notion of limited, local assistance, is picked up and translated into one of the proposals that is discussed in the funding section laid out in more detail below.

SUMMARY

One potential conclusion from the above is that Colorado may be "doing bad" if it concentrates *only* on trying to raise funds for some large centralized distribution network. In addition to this type of large scale fundraising, Colorado perhaps should try to build a decentralized distribution network as well. Such an approach is consistent with much of the political thinking today. A means for developing this approach is laid out below.

48. ~~It probably can safely be assumed that this is per *heating season*, but that information was not specifically requested.~~

CHAPTER 5: THE ROLE OF ENERGY EFFICIENCY

When all is said and done, for households who truly cannot afford their energy bills only two broad strategies are available. These strategies can be pursued alone or in combination with each other. In responding to the inability to afford home energy bills, either one can increase household income or one can reduce household expenses.⁴⁹ The household expense at issue here, of course, is the household home energy bill. While other responses may be necessary and appropriate to address certain *consequences* of low-income inability-to-pay --a winter moratorium is one example of such a regulatory response-- only the income and expense strategies will directly address the root cause of the problem.

Providing cash assistance is probably the primary approach to addressing low-income inability-to-pay problems. Cash assistance can help meet winter emergencies, can address the problems of even the lowest income households, and can be used to meet immediate needs. Addressing low-income energy problems, however, involves more than simply providing cash fuel assistance. While cash assistance is unquestionably necessary, particular during high cost winter months, a low-income agenda must include, also, energy efficiency improvements.

Weatherization can be an effective tool to use in reducing low-income energy needs for many, but not all, households. In fact, the plight of many of the households most significantly in need can be addressed through increased efficiency in usage. It is generally recognized that weatherization assistance is a more efficient means of addressing low-income energy needs over the long term than the distribution of fuel assistance.

49. While counseling in family budgeting and money management is an available alternative, as will be discussed below, the energy needs of low-income households generally represent an absolute mismatch between household income and expenses. The problems of the poor of Colorado do not represent money management failures.

Weatherization provides continuing benefits year-in and year-out. Fuel assistance, on the other hand, provides a one-time cash supplement to help pay current utility bills (including arrears in some cases). Each year, a new one-time cash supplement must be provided.

Like fuel assistance, however, weatherization has substantial limitations that limit its effectiveness. It is inadequately funded. Federal Weatherization Assistance Program (WAP) dollars will never be adequate to provide services to all eligible low-income homes needing weatherization within a reasonable period of time. Federal WAP appropriations today stand at a fraction of what they were at their peak. In addition, Colorado used oil overcharge dollars in the mid- to late-1980s to supplement federal appropriations. This source of supplemental funding has now been exhausted. Moreover, even if adequately funded, there are functions that weatherization simply cannot serve, and populations that weatherization simply cannot help. While weatherization, for example, can reduce future bills, it cannot help pay unaffordable arrears.

Finally, even at peak efficiency, weatherization can make only a small dent in the needs of low-income households. Even if WAP were successful in reaching all homes, the scope of the program is more limited than low-income households need. Weatherization programs generally deal only with space heating. Space heating represents less than 40 percent of a household's energy budget. Thus, for every two percent of heating energy saved through a weatherization program, less than one percent of the *total* energy budget would be saved. While it is true that these programs can substantially cut costs for heating and cooling homes, they are less valuable for helping reduce total energy costs. Thus, even if an ambitious 20-year goal were achieved, the results would be an increase in efficiency for only the less than half of the typical household energy bill dedicated to heating. Low-income households will still face a burden in their *total* energy bills. This burden would be exacerbated if actual weatherization program savings are lower than those predicted.

Finally, for some households with very low-incomes, no amount of weatherization will be able to bring their bills low enough to be "affordable" from a percentage of income perspective. One 1994 assessment of natural gas winter home heating bills nationwide concluded:

The winter heating crisis facing low-income households is not a problem that can be addressed by increasing weatherization funds alone. The winter heating burdens faced by low-income households are not simply a function of high energy bills, but instead are a function of the interplay between energy bills and income. While weatherization unquestionably plays an important role in helping to address unreasonable low-income winter heating burdens, even if given "unlimited" funding, weatherization alone would be inadequate to redress the mismatch between household heating expenses and

household resources available to pay those expenses.⁵⁰

Some households simply have so little income, virtually *any* energy bill will be burdensome.

As is apparent, while it is imperative to increase the efficiency of low-income energy use to the maximum extent possible, it would be unwise to focus attention strictly on energy efficiency. Hence, whatever the level of effort or funding for low-income energy efficiency,⁵¹ there will always be a need for a cash supplement program. Energy efficiency, while an adequate long-term solution for many, simply cannot address the energy problems for the lowest income households with the highest energy burdens.

In sum, increasing energy efficiency in low-income housing is a crucial part of the response to low-income inability-to-pay problems in Colorado. It is, however, not the only response and, perhaps, is not even the *primary* response for many low-income households. Developing mechanisms for increasing funding for low-income weatherization is left to another day not because it is unimportant, but rather simply because it is beyond the purview of the scope of this study.

50. Sheehan, M. (1994). *On the Brink of Disaster: A State-by-State Evaluation of Low-Income Natural Gas Winter Heating Bills*, Osterberg & Sheehan, Public Utility Economists: Scappoose, OR.

51. Delivering energy efficiency, of course, is not simply a matter of funding. There must be the institutional capacity to deliver the efficiency measures as well.

CHAPTER 6: ENERGY USE AND ENERGY BILLS IN COLORADO

The three primary space heating fuels for low-income households in Colorado are natural gas, electricity and LP gas. Each of these fuels imposes different costs, and thus different burdens on households (as a percentage of income).

LOW-INCOME FUEL USE IN COLORADO

Natural gas is the primary fuel used for space heating in Colorado by a substantial amount. The same is true for low-income households in Colorado. Statewide, roughly 70 percent of all households and 80 percent of low-income households use natural gas as their primary heating fuel. In contrast, electricity is the primary fuel for space heating in 17 percent of all households and 14 percent of low-income Colorado households. LP gas falls even further behind, being used by six percent of all households and four percent of low-income households.

Fuels Used for Primary Heating in Colorado All Households and Low-Income Households			
	Natural Gas	Electricity	LP Gas
Pct of all households using	70%	17%	6%
Pct of low-income households using	81%	14%	4%

Other fuels (such as coal, wood, solar, kerosene) fall far behind, using just a fraction of one percent within each population.

While figures show a reliance on natural gas for heating in the state as a whole, a county-by-

county examination of fuels reveals a quite different pattern of primary heating fuel usage.⁵² Thus, for example, while 80 percent of all households statewide use natural gas as their primary heating fuel, if one takes an average of the county penetrations instead, the statewide average use of natural gas is only 56 percent. In contrast, while only five percent of all households statewide use LP gas as their primary fuel source, if one takes an average of the county penetrations instead, the statewide average use of LP gas is 24 percent. Only with electricity is the statewide penetration (14 percent) consistent with the average of the county penetration rates (16 percent). The county-by-county distribution of fuel penetration for the total population is set forth in Table D-1.

What this means is that some counties have a very high penetration rate of fuels other than natural gas, yet have insufficient numbers of households overall to affect the statewide average. Thus, for example, Archuleta County has only 34.5 percent of its households using natural gas, while 43.1 percent use LP gas, but has only 1100 households overall. Elbert County, too, has only 21.1 percent of its households using natural gas, while 57.3 percent using LP gas, but has only 2800 households overall. In contrast, Arapahoe, Denver and El Paso counties all have more than 83 percent of their households using natural gas and 140,000 or more households in total in each county.

Note that it is *not* the case that rural counties tend generally to have significantly more households relying on electric space heating in Colorado. Only a handful of counties have penetrations of electric space heating substantially greater than the statewide average of 14 percent. Eagle, Grand, Gunnison, Ouray, Park, Pitkin, Routt, San Miguel and Summit counties all have electric space heating penetrations of from roughly 25 to 40 percent. In contrast, 13 counties have electric space heating penetrations of six percent or less (while six counties --Baca, Bent, Conejos, Crowley, Kiowa, Otero-- have electric space heating penetrations of four percent or less).

The differences in space heating fuel penetration appear perhaps most prominently within LP gas users. LP gas is used by more than 30 percent of the population in 20 counties in Colorado, and used by more than 20 percent of the population in an *additional* 12 more counties. The fact that LP gas represents the primary space heating fuel in only five percent of the total households statewide is an indication simply that the penetrations in the larger counties are quite small (Arapahoe=1.0%, Boulder=3.1%, Denver=0.9%, El Paso=3.4%, Jefferson=2.2%, Larimer=4.2%).

The extensive reliance on LP gas as a primary heating fuel is of significant concern to persons interested in delivering fuel assistance to low-income Colorado households. From a program perspective, there are a variety of related problems:

52. A county-by-county distribution of low-income fuel use is not available. This analysis is based on the total population.

- o As shown below, the use of LP gas subjects low-income consumers to continuing and substantial price increases, which far outstrip price increases for either electricity or natural gas.
- o The use of LP gas means that it is not possible to deliver substantial winter heating assistance to these households through home *utility* bills. Any utility-oriented program will, in other words, miss the substantial number of LP gas customers.
- o The use of LP gas makes the administration of low-income winter heating assistance more difficult. It is always more difficult to work with a large number of vendors than it is to work with a relatively discrete number of utilities.

The administration of the low-income energy assistance program in Colorado will be discussed further in a separate chapter below.

PRICE OF PRIMARY SPACE HEATING FUELS

Natural gas is both the least expensive primary heating fuel in Colorado and the heating fuel that has been subject to the least inflation in prices in recent years. As Table D-2 shows, the price per million BTU of energy⁵³ for natural gas was only \$4.46 in 1992⁵⁴ as compared to \$21.11 per mmBtu for electricity and \$7.32 per mmBtu for LP gas.

While Table D-2 shows that the price of natural gas has been subject to the greatest amount of increase in the past 20 years, the escalation of gas prices occurred early in that time period. In more recent years, electricity prices have continued to escalate, while natural gas prices have levelled off (and even decreased). The price of electricity increased by more than 40 percent from 1980 to 1992 while the price of natural gas increased by 37 percent during that time period. Since 1990, the price of natural gas has substantially moderated.

In contrast, LP gas has seen continuing and substantial price escalation in Colorado, increasing by nearly 330 percent from 1970 to 1992 and seeing continuing increases since 1980 and 1990. By 1987, the price of propane had dropped to \$5.18 per mmBtu and by 1988, it had dropped to \$2.51/mmBtu. By 1990, however, the price of propane had climbed back over the \$7.00/mmBtu threshold.

53. BTU are British Thermal Units. It is the amount of energy that is needed to raise the temperature of one pound of water one degree. BTUs are used to allow inter-fuel comparisons of price, efficiencies and the like.

54. 1992 is the last year for which data is now available.

The impact of these price differences in heating a low-income home in Colorado, when combined with differences in the relative efficiency of the respective fuels, yields substantial differences in the cost to heat a home. While, on average, the cost to heat a home with natural gas in Colorado was only \$245, the cost to heat the same home with electricity would be \$932; the cost to heat the same home with propane would be \$403.

{PRIVATE }Comparative Cost to Heat Identical Home: Natural Gas, Electricity and Propane			
	Natural Gas	Electricity	Propane
mmBtu to heat	44.0	44.0	44.0
mmBtu per energy unit /a/	0.1/therm	.003412/kWh	.0915/gal
Efficiency of fuel	0.8	1.0	0.8
Units of energy to heat	550	12,941	601
Cost per unit of energy /b/	\$0.446	\$0.072	\$0.670
Total cost to heat	\$245	\$932	\$403
NOTES:			
/a/ Natural gas units are therms, electric units are kWh, propane units are gallons.			
/b/ Fuel costs assumed to be: natural gas (\$4.46/mmBtu), electricity (\$21.11/mmBtu), propane (\$7.32/mmBtu).			

LOW-INCOME HOME ENERGY BURDENS

Energy is a necessary ingredient in running a modern household. It is used for lights, for refrigerators and other appliances, for hot water, and for space conditioning (including both heating and air conditioning). Providing the energy to run a household represents a significant expense in Colorado. The expense increasingly becomes a burden as the household income decreases. The purpose of this section is to consider the energy burden for low-income households.

Statewide Comparisons

Estimates of consumption and expenditures for low-income households in Colorado are presented below.⁵⁵ Each of these estimates is broken down by three major end-use categories: space heating, air-conditioning, and all other uses.

As it is difficult to compare a kilowatt-hour of electricity to a gallon of gasoline or to a cubic foot of natural gas, energy must first be converted into a common unit. Therefore, energy consumption is expressed in this report in units of one million British Thermal Units (mmBtu).⁵⁶ This puts all sources on a comparable basis. Energy expenditures are reported for the same three categories in 1994 dollars.

Energy consumption patterns for an average household and for a low-income household in the state are presented in the Table below. Again remember, however, that these figures are based on a number of averages: average household size; median household income; weighted average of heating fuel types; average Heating Degree Days (HDD) and Cooling Degree Days (CDD); and the like.

{PRIVATE }Estimated Energy Consumption Patterns, Colorado Households (mmBtu)		
Consumption	Average Household	Low-Income Household
Heating	54.4	44.0
Air-Conditioning	3.9	1.6
All Other Uses	38.2	31.6
Total	96.5	77.2

55. While the data provides a useful look at the relative scale of consumption and expenditures at the selected income levels, it does have some apparent weaknesses that must be recognized. The data, for example, show energy consumption and expenditures for an "average household" that in reality does not exist. Moreover, due to the complexities of such undertakings and the unavailability of certain data, it is difficult to reflect all of the possible combinations. For example, the information does not account for differences in types of dwellings (single or multi-family). It does not consider ranges of income, but rather only average incomes. The use of averages, of course, masks the extremes. Despite these shortcomings, however, particularly if acknowledged up-front, the model generates reasonably adequate data upon which to base an analysis.

56. One million BTUs is approximately equal to the energy contained in eight gallons of gasoline or 300 kilowatt-hours of electricity. It is also equivalent to 1,000 cubic feet of natural gas.

As can be seen, the average household uses roughly 56 percent of its energy on space heating (54.4 mmBtu of total use of 96.5 mmBtu). Moreover, the average low-income household uses roughly 57 percent of its energy on heating (44.0 mmBtu of 77.2 mmBtu total). Overall, the low-income household in Colorado uses about 80 percent of the energy used by the average household (77.2 mmBtu vs. 96.5 mmBtu). This is generally attributable to the fact the low-income households tend to live in smaller units and thus have fewer square feet to heat.

The ratio of consumption by a low-income household to that of an average household begins to look like a serious problem when expenditures and incomes are included in the picture. While consuming roughly 80 percent of the energy of the average household, the low-income household *pays* less. The average low-income household pays about 67 percent of what the average household pays for total home energy (\$1,129 vs. \$1,680). Low-income households in Colorado, unlike many states, tend to use *less* expensive energy sources than other households. For example, while 70 percent of all households in Colorado use natural gas for heating, more than 80 percent of low-income households do. While 17 percent of all households use electricity for heating, only 14 percent of low-income households do.⁵⁷ Both of these trends tend to lower the average cost for all heating fuels paid by low-income households. Moreover, low-income households in Colorado have significantly less cooling consumption as well as significantly less consumption for "other" electric appliances.

While heating consumes more energy in Colorado, the non-heating portion of a household's home energy bill consumes more dollars. The average household in Colorado spends only 29 percent of his or her bill on heating (\$487 of \$1,680), while the low-income household spends roughly 35 percent (\$494 of \$1,129). The difference between costs and consumption, of course, is attributable to the expense of electricity (used for cooling and other appliances) *vis a vis* natural gas (used primarily for heating).

{PRIVATE }Estimated Energy Expenditure Patterns, Colorado Households		
Expenditures	Average Household	Low-Income Household
Heat	\$487	\$393
Air-Conditioning	\$86	\$37
All Other Uses	\$1107	\$699
Total	\$1,680	\$1,129

57. It is possible, without having studied the issue, that this reflects the concentration of low-income households in the larger urban areas in Colorado which are primarily served by natural gas heating.

This lower heating (and total energy) bills in Colorado, however, is offset when differences in income are considered. For instance, the average household size in Colorado is 2.6 persons and 1989 median household income for this average household is \$30,140. By definition, however, the same household containing 2.6 persons living at 100 percent of the federal Poverty Level had a 1989 income of about \$9,244. As a percentage of its income, therefore, the low-income household living at exactly Poverty Level thus spends 2.2 times what the average household spends on energy (5.6% vs. 12.2%). Remember, however, that "at or below" implies that most people are "below" rather than "at" the ceiling. Households living below the Poverty Level spend an even larger percentage of their income on total home energy. The *average* person living at or below Poverty in Colorado⁵⁸ would spend 3.9 times what the average household spends on total home energy (not simply heating) (5.6% vs. 21.8%).

How Colorado Counties Compare

The statewide results discussed above do not tell the entire story of low-income energy needs in Colorado. In addition, county-specific data was considered to produce consumption and expenditure averages for each county as well. The county-specific data included median household income, average household size, climactic data, primary heating fuel-type information and average fuel prices.

Consumption and expenditure estimates were generated for heating, air-conditioning, and all other uses, for both average households and low-income households in each county. The results of this process are presented in Table D-3 and Table D-4.

Again it should be stressed that the figures in these Tables are not presented here as absolute markers. Rather, they are meant as averages which will present a relative scale of the problems faced by low-income households in each county. For example, it is interesting to note that the percentage of energy used to heat low-income homes appears to move from a low of roughly 50 percent in a variety of counties⁵⁹ to a high of roughly 68 percent in Gilpin County.

As might be expected, counties with colder climates tend to have higher average heating consumption. Counties that have mostly rural populations tend to have larger household sizes. Some counties have noticeably larger homes for low-income households. Each of these situations also tend to result in higher consumption. These trends tend to be offset somewhat by other factors. For instance, the mostly rural counties rely to a larger extent on

58. The average Poverty Level for households living at or below 100 percent of Poverty in Colorado is 56 percent.

59. Denver, Mesa, Prowers, Pueblo, and San Miguel.

relatively expensive heating fuels, such as LPG. There is little natural gas in these rural counties, a relatively inexpensive fuel. Reliance on these relatively expensive fuels tends to lower consumption somewhat.

On the other hand, counties with larger urban populations tend to have smaller average household sizes and smaller homes. These factors tend to keep consumption in these areas down. These factors are offset as well. Urban areas tend to have a higher percentage of homes heated by natural gas, which tends to greatly reduce average heating costs per household. In addition, when heating is less of a burden, households tend to use more energy for other needs. This tends to raise total energy consumption in warmer areas that have lower energy costs.

Counties that have lower heating (or total energy) usage and bills may be marked by a variety of factors. These include lower heating degree days, a different mix of fuels, and smaller housing sizes. Contrast, for example, the square feet of heated space in Denver and Huerfano counties (1635 and 1653 respectively) having low bills with the square feet of heated space in Douglas and Elbert counties (2292 and 2060 respectively) having higher bills. Similarly, contrast the percentage of space heating provided by electricity in Baca and Bent counties (2.8 and 2.6 percent respectively) having lower bills with the percentage of space heating provided by electricity in Gilpin, Park and Routt counties (24.9, 29.5 and 38.3 percent respectively) having higher bills.

Finally, different counties have dramatically different electric bills. While the price per kWh of electricity for a customer of Public Service Company (PSCO) is almost exactly the statewide average (\$21.45/mmBtu for PSCO vs. \$21.56/mmBtu state average), the price for Intermountain is somewhat higher (\$24.06) and for Southeast Colorado Power (\$29.87) and San Isabel (\$28.52) substantially higher. In contrast, the electric prices of Highline (\$19.05) and Mountain Parks (\$19.58) are substantially lower.

How Different Levels of Poverty Compare

As discussed in detail above regarding the definition of who is "poor" in Colorado, it is important to avoid the assumption that households who live "at or below" a certain level of Poverty live *at* the ceiling. As may be self-evident when considered, but as is all too *infrequently* considered, as the level of Poverty goes down, the burden which energy bills (both heating and total energy) represent as a percentage of income will increase, sometimes dramatically.

Tables D-5 (heating bills) and D-6 (total energy bills) depict the extent to which decreasing levels of Poverty for low-income households will affect the energy burden which those households face. Not surprisingly, the households living at 0 to 50 percent face *total* home energy burdens (Table D-6) that range anywhere from 13.5 to nearly 50 percent of income. They face *heating* energy burdens (Table D-5) ranging from 5 to 17 percent. Moreover, as

these Tables make clear, the *household size* affects the energy burden as well, with larger households having large incomes that make energy burdens less. Note, for example, that of all households living at from 0 to 25 percent of Poverty, the burden for total energy (Table D-6) ranges from 26.9 percent (6-person household) to 48.1 percent (1-person household).

While a distribution of households by Poverty Level and household size is not available in Colorado on a county-by-county basis, Table D-7 presents the statewide data. As this Table reveals, the number of households living at these lower Poverty Levels is substantial.

COST TO MAKE LOW-INCOME ENERGY BURDENS "AFFORDABLE"

Deciding what cost must be attached to addressing low-income energy needs in Colorado depends in large part on the answers to four basic questions:

- o Who is the low-income population?
- o What energy burden is to be considered "affordable"?
- o What part of the energy bill should be addressed? and
- o What proportion of the population is assumed to be reached by an energy affordability program?

The decision regarding how to define the low-income population was discussed at length above. The population can be defined in terms of dollars of income, in terms of percent of the federal Poverty Level, or in terms of percent of median income. The choice below is to use 150 percent of the federal Poverty Level. This is not to be construed, however, as a principled judgment on who is "poor" in Colorado. Rather, *for purposes of illustration only* of the magnitude of the energy assistance need, 150 percent of Poverty was chosen because it is a commonly understood standard of "being poor."⁶⁰ Use of this standard, however, should not be construed as an endorsement of a conclusion that it accurately portrays or defines who is "poor" in Colorado.

In response to the second question, the analysis below calculates the cost of reducing low-income energy burdens to the percent of income paid by the population as a whole. Again, the decision is concededly somewhat arbitrary. While, however, it is not possible to develop a sound principled basis for the point of affordability that *is* chosen, it is nonetheless possible to reject several alternatives on a principled basis. For example, the goal is not simply to

60. In contrast, under federal statutes, LIHEAP eligibility can range up to 60 percent of median income. Fifty percent of median income is generally considered to be roughly equal to 200 percent of Poverty.

eliminate service terminations. Many households may pay their utility bills so as to avoid service disconnections while at the same time skimping on other household necessities such as food.⁶¹ In such a case, even though "paid," the bill should not be considered "affordable." Similarly, it is inappropriate to seek to cap all low-income bills at some low-income class average percent of income burden. This conclusion is based on the fact that, in addition to the affordability issue raised immediately above, it is difficult (if not impossible) to distinguish between *billed* revenue and *paid* revenue in this situation. And simply because low-income *bills* represent some burden as a percent of income does not mean those bills are paid, let alone affordable even if paid.

Given the rejection of these alternative objective measures, this analysis chooses the reduction to the total population average as the benchmark for affordability. The extent to which a policymaker may seek to increase the level of burden to be supported by a public assistance program involves both equitable/political questions --*i.e.*, is it "fair" to require poor people to pay three times the burden for essential heating services even if somehow objectively "affordable"-- and budget questions --*i.e.*, how low of a burden can we afford to pay for.⁶²

The third question presents the issue of whether the fuel assistance program should be directed toward home *heating* bills or toward total home energy bills. This analysis opts for total home energy bills, although it presents a heating scenario for comparison. The fact is that home heating, while obviously critical in a state such as Colorado, is nonetheless less than half of a low-income household's total home energy bill. Keeping home heating affordable does not in any way imply that home energy is affordable. Moreover, in many instances, the non-heat electricity is essential to the operation of the non-electric heating systems, whether it be due to fans, or pumps or electric ignitions. It is, therefore, often impossible to separate the adverse impacts of unaffordable total energy bills from the adverse impacts of unaffordable home heating.

Finally, as discussed in detail below, it is unreasonable to plan for a 100 percent participation in any low-income fuel assistance program. Some people will not participate because they don't need any help. Some people will not participate because they do not want public

61. These households may also unreasonably deny themselves heating and electric service by turning down thermostats to unhealthy levels or closing off substantial portions of their homes.

62. In deciding upon costs, however, it is important to bear in mind that the costs of a program are not linearly related to the percentage of income burden chosen. Hence, for example, if reducing all low-income bills to five percent of income costs \$100, reducing those bills only to 10 percent of income would not necessarily be only half as expensive. The same is true for defining the population. On average, it costs more to reduce the utility bills of persons living at 50 percent of Poverty to an affordable level than it does to reduce the utility bills of persons living at 200 percent of Poverty. Increasing the eligibility of an affordability program, therefore, does not add a proportionately large increase in costs.

assistance in any form. Some people will not know of the program, while others will know of the program but not know when or how to apply. Others will face specific barriers to participation. Despite this, the analysis below presents a cost assuming 100 percent participation simply to set the outer limit of costs. In fact, given the wide range of reasons for nonparticipation, however, a substantially lower penetration can be expected.

Given this introduction to the cost analysis, Table D-8 shows that the cost of a low-income heating assistance program would be roughly \$65.7 million in Colorado. Table D-9 shows that a low-income total energy assistance program, given those same constraints and disclaimers, would be roughly \$195.6 million. Both of these figures, however, should be viewed in light of the constraints and disclaimers discussed above. Primarily, they both assume a 100 percent participation rate amongst all eligible households, a rate which will never be obtained.⁶³

Again, however, these figures are set forth simply as a benchmark. As discussed in detail above, the percentage of income burden to which a fuel assistance program will seek to reduce low-income energy bills involves not merely affordability considerations, but political and budgetary considerations as well. As Table D-10 points out, if Colorado were to reduce low-income total energy bills to ten percent of income (rather than to the statewide average for the total population), the cost of the program drops to \$125.0 million. As Table D-11 shows, if the target total home energy burden were set at 12 percent of income, the total cost of the program drops to \$93.2 million.

SUMMARY

While low-income energy use, as well as low-income energy bills, is substantially less than that of the average household in Colorado, the *burden* which such bills place on low-income households is considerably greater. Even though low-income households use only 80 percent of the energy as the average household, and pay only 70 percent of the bill, the total home energy expenditures for the poor represent a burden almost four times (3.9x) as great (5.6% vs. 21.8%).

This increased burden occurs despite the fact that, unlike many other states, the poor in Colorado do not disproportionately rely upon more expensive heating sources such as electricity. While 70 percent of all households use natural gas for heating (and 17 percent use electricity), 80 percent and 14 percent of low-income households use gas and electricity respectively.

While these figures are correct statewide, they are misleading when applied to individual counties. In many counties in Colorado, households do, indeed, rely upon expensive sources

63. In contrast, the LIHEAP participation rate is less than 40 percent.

of heating. Thus, for example, even though propane represents the primary heating fuel in only four percent of homes statewide, it is used as the primary source of space heating by more than 30 percent of the population in 20 counties in Colorado and by more than 20 percent of the population in an *additional* 12 counties.

Evaluating heating usage, however, should not be the exclusive focus of an examination of home energy bills. In Colorado, the average low-income household pays less than 40 percent of its home energy bill on heating. To address unaffordability problems, in other words, will require an effort to address total home energy, not simply heating.

The cost to make home energy "affordable" to low-income households is considerable. Defining the low-income population to be those households at or below 150 percent of the federal Poverty Level, defining "affordability" to be the average energy burden of households generally, and assuming that 100 percent of the low-income population is reached by an affordable rate program, the cost to make total home energy bills

affordable for the poor is more than \$196 million, while the cost to make simply home heating bills affordable is roughly \$66 million. Changing assumptions can dramatically change these costs. For example, reducing home energy bills to ten percent of income (rather than to the total population average) reduces the total cost to \$125.0 million. Reducing home energy bills to twelve percent of income reduces total costs to \$93.2 million.

CHAPTER 7: LIHEAP PERFORMANCE REVIEW

One recent move in evaluating state LIHEAP programs has been to introduce a greater degree of performance management into the program. In mid-October, 1995, the Division of Energy Assistance, which administers LIHEAP within the U.S. Department of Health and Human Services (hereafter sometimes referred to as the federal LIHEAP office), released its draft *Model Performance Goals and Measures*.⁶⁴ According to that draft document:

In the past, much of the focus on measuring success has been on the effort expended and resources dedicated to a program by a government agency (what are known as 'inputs') and on the number of beneficiaries assisted (the 'output'), rather than on the effect the program has on the beneficiaries (the 'outcome' or 'impact'). Recently, consensus has been reached that input and output measures do not necessarily indicate success, if the assistance offered is not helpful to the person or entity receiving it. For this reason, there is increased emphasis on looking at the effect programs have on their recipients in order to measure their success.

Accordingly, there is now general agreement that programs must determine and describe the outcomes they expect to achieve (*i.e.*, they must manage for results). Instead of focusing exclusively on inputs and program activities, programs need to concentrate on the program's impact on people.

The federal LIHEAP office then stated that one key aspect to evaluating LIHEAP "is the requirement that programs need to develop results-oriented measures of success (or failure) and report each year on progress achieved on those measures." After a prolonged process of

64. *Draft LIHEAP Model Performance Goals and Measures, Proposed by the Division of Energy Assistance, Office of Community Services, ACF, HHS (Oct. 16, 1995).*

consideration, the LIHEAP office then adopted two "primary goals" and one "additional goal" for LIHEAP. According to the LIHEAP office, "primary goals are those goals that appear to be central to the operation of LIHEAP. The two primary goals adopted by the federal LIHEAP office include:⁶⁵

- o To target energy assistance to low-income households with the highest home energy needs, taking into account both energy burden and vulnerable household members. and
- o To increase energy affordability for LIHEAP recipient households.

The third goal is to increase the efficiency of energy usage by low-income households.

Because this research project has not examined energy efficiency programs, the third goal is set aside for purposes of the analysis below. However, the first two goals --that of affordability and targeting-- are considered below. To the extent possible, the data below will be set forth on a county-by-county basis for Colorado.

THE AFFORDABILITY OF ENERGY AFTER LIHEAP

Two issues immediately march forward when considering the affordability of energy to low-income Colorado residents after such residents have received LIHEAP benefits. The first question involves whether the focus of fuel assistance simply on winter heating bills allows home energy to be affordable after LIHEAP benefits have been distributed. The second is whether, assuming a home heating focus is appropriate (either as a matter of policy or budget constraints), the definition of the "heating" season appropriately captures home heating needs.

Year Round LIHEAP Benefits

Given the facts established above that home heating represents less than 60 percent of total low-income energy consumption and less than 40 percent of total low-income energy expenditures in Colorado, one question that arises is whether LIHEAP benefits would be better spent through an annual distribution rather than through a distribution limited only to the winter heating season. Through an annual distribution, LIHEAP benefits would be provided in twelve monthly installments.

Taking as a performance measure the reduction of home energy bills to an affordable energy burden (bill as a percent of income), it would seem that such an annual distribution is not

65. The term "proposed" is used with emphasis here: The goals have merely been released in draft form for comments. They have not been adopted by HHS and could be changed, perhaps substantially.

well-designed to provided affordability benefits to low-income Colorado residents.

Tables E-1 through E-3 present the analysis. As this analysis shows, spreading LIHEAP benefits over a twelve month period dilutes each monthly benefit so that bills remain unaffordable during each month despite the receipt of public assistance. The Tables include:

- o Table E-1 distributes the annual home energy bills found for low-income Colorado residents over a twelve month period. Using 30-year average Heating Degree Days (HDDs) and Cooling Degree Days (CDDs) on a county-by-county basis, this Table distributes: (a) the heating bill over months in proportion to the Heating Degree Days in each month; (b) the cooling bill over months in proportion to the Cooling Degree Days in each month; and (c) the "other electric" bill over months in equal monthly installments.⁶⁶
- o Table E-2 distributes the annual average LIHEAP benefit in each county in twelve equal monthly installments and subtracts those benefits from the monthly home energy bill. The bill remaining after subtracting the LIHEAP benefit is presented in this Table.
- o Finally, Table E-3 calculates the percentage of income energy burden in each county for each month if one assumes that LIHEAP has been distributed on an equal monthly basis.⁶⁷

As Table E-3 shows, distributing LIHEAP benefits through a monthly installment payment results in winter home energy bills often remaining above affordable levels. In 32 counties, January home energy burdens would exceed 20 percent of income after LIHEAP, while in an additional 14 counties, winter home energy burdens would be at 18 - 19 percent of income. These high energy burdens are not offset by affordable non-winter bills. As Table E-3 shows, even with a monthly distribution of LIHEAP, August home energy burdens would exceed 10 percent of income in 28 counties.

In many ways, this result should not be surprising. The effectiveness of LIHEAP is limited by the funding levels approved by Congress. LIHEAP has never been funded at a level that would allow it to serve as an effective public assistance program directed toward total home energy needs. While LIHEAP is allowed under federal law to be used as a cooling

66. This Table is important, too, even aside from testing the monthly distribution of LIHEAP benefits, in that it shows the flow of low-income home energy needs throughout the year. The Table demonstrates that low-income home energy needs are not limited to the winter months.

67. The income is assumed to be the average low-income for households living at or below 100 percent of Poverty.

supplement, its primary purpose has always been considered a home heating assistance program. The fact that LIHEAP funding in Colorado is insufficient to bring total home energy bills down to affordable levels if spread over a full twelve month period should come as no surprise.

Without the major influx of additional fuel assistance dollars calculated in Chapter 5 above, it would not seem to be appropriate public policy to distribute LIHEAP benefits in equal monthly installments.

In addition to the problems associated with inadequate funds for year-round benefits, Colorado would lack the funding for year-round administration as well. By federal law, allowable LIHEAP administrative expenses are capped at 10 percent of the available LIHEAP dollars. As LIHEAP appropriations decrease, it becomes more and more difficult to comply with this 10 percent limitation. LIHEAP administrative expenses do not vary based on the size of the benefit check which is provided to each recipient. Moreover, many administrative expenses are fixed, and thus not subject to the number of clients served. As the data immediately below shows, even given the substantial influx of private dollars through the Colorado Energy Assistance Foundation (CEAF), Colorado would find it impossible to add the administrative expenses associated with a year round program and still remain within the prescribed limits on administrative expenses.

{PRIVATE }Colorado Administrative Expenses as Percent of Total Resources: 1984 - 1995			
Fiscal Year	Total Resources	Administrative Costs	Percent
1984	\$35,760,047	\$3,391,000	9.5%
1985	\$39,799,926	\$3,247,885	8.2%
1986	\$36,187,649	\$2,852,308	7.9%
1987	\$32,049,511	\$2,962,224	9.2%
1988	\$28,490,147	\$2,108,358	7.4%
1989	\$27,052,912	\$1,999,228	7.4%
1990	\$23,245,694	\$1,488,627	6.4%
1991	\$24,523,540	\$2,100,000	8.6%
1992	\$26,126,568	\$2,305,656	8.8%
1993	\$30,473,626	\$2,082,050	6.8%
1994	\$26,679,626	\$2,280,593	8.6%
1995	\$23,551,064	\$2,064,406	8.8%

Heating Needs and the Definition of the "Heating Season"

The conclusion that LIHEAP is insufficiently funded to adequately address total year-round home energy needs does not detract from the observation that LIHEAP could more adequately encompass total home heating needs in Colorado. As Table E-4 shows, defining the winter heating season as the six months of November through April misses a significant part of low-income heating needs in Colorado. In 26 Colorado counties, the months of November through April include only 80 percent or less of the total annual HDDs. In an additional 14 counties, that six month period contains only 80 to 85 percent of the annual heating degree days.

If one were to redefine the heating season to include, also, the shoulder months of October and May, the LIHEAP program would serve to address the greatest part of heating needs in the state. As Table E-4 shows, adding the shoulder months of October and May would increase the coverage of HDDs to the mid-90 percent range in virtually every county. Table E-4 shows, as well, that if one were to choose between October and May as a shoulder month, it would be more important to cover October than to cover May's heating bills. As the Table shows, October presents nearly the same heating load as April does in virtually every county. Distribution of LIHEAP benefits in Colorado should take these heating loads into consideration.

This recommendation, however, may be unmanageable in light of recent federal funding cutbacks. Deep cutbacks in federal dollars have resulted in reduced, not expanded, benefits as well as a reduction in the number of months the program operates. Beginning in Fiscal Year 1996, LIHEAP in Colorado was open only for four months a year rather than the full six months of the winter heating season as in the past. While taking the additional heating needs of October and May into account would make good policy sense, even this cannot be done at existing funding levels.

TARGETING LIHEAP BENEFITS

One of the purposes of LIHEAP, according to the federal LIHEAP office, is to target assistance to particular "vulnerable" populations. Amongst those vulnerable populations are the elderly.⁶⁸ It is possible to consider the extent to which the Colorado LIHEAP program has targeted this population. The measure to be used in this report was set forth in the October 1995 performance review transmittal by HHS:

$$\frac{\# \text{ vulnerable households served} / \# \text{ households served}}{\# \text{ eligible vulnerable households} / \# \text{ eligible households}}$$

As HHS notes, any figure developed by this calculation which is greater than 1.0 means that a greater proportion of those served were vulnerable than in the eligible population. According to HHS, this "means that a program has effectively targeted vulnerable households."⁶⁹

Colorado does an excellent job of targeting the elderly as a vulnerable population. As Table E-5 shows,

68. Other vulnerable populations have been identified: the disabled, households with children, and households with high heating burdens, defined to be home energy bills as a percentage of income. Data on the disabled population by Poverty Level is not readily available. Nor is data on individual home energy burdens available. This review, therefore, will look only at households with aged members.

69. Due to data limitations, the data to be used in this calculation considers households at or below 100 percent of Poverty Level rather than at or below 150 percent of Poverty.

statewide, the performance ratio for Colorado's aged targeting is 2.0.⁷⁰ Since, as we have seen before, the numbers in the large counties can often mask significantly different results in the smaller counties in Colorado, it is appropriate to examine targeting results on a county-specific level as well. The performance ratios on a county-by-county basis are generally also excellent. In only four (4) counties does the performance measure fall below 1.0 and in only nine (9) additional counties does the performance measure fall between 1.0 and 1.2.

THE RELATIONSHIP BETWEEN HIGH ENERGY BURDENS AND HIGH SHELTER BURDENS

As noted above, one of the "targeting" principles developed by the federal LIHEAP office was to focus benefits on those households with high energy bills in relation to income, *i.e.*, those with high energy "burdens."⁷¹ Data on individual energy bills is not available and thus this targeting principle cannot be directly measured. However, it is possible to consider the relationship between high energy costs and high *shelter* burdens. This section looks at those shelter burdens as a surrogate for high total home energy costs.⁷² According to the U.S. Department of Housing and Urban Development (HUD), which develops the data used in this section, "shelter costs" include rent or mortgage payments along with all utility bills (excepting telephone). Thus, for example, electricity, home heating, water/sewer, and trash collection are all included within the rubric of "shelter costs."

In addition to maintaining the *physical* viability of housing in Colorado, utility low-income energy affordability programs can help maintain the *financial* viability, *i.e.*, the "affordability," of such housing as well. According to federal standards, shelter costs become unaffordable when they exceed thirty percent of income. It is frequently thought that unaffordable shelter costs are the province only of extremely poor tenants. As Tables E-6 and E-7 show, however, shelter costs exceeding 30 percent of income (or, indeed, 50 percent of income) are common even through fifty percent of county median income. Moreover, unaffordable shelter burdens are common amongst both renters and homeowners.

It is important for persons interested in addressing unaffordable energy bills to be aware of how energy and shelter are so inextricably related. In addition to the direct problems imposed upon the households who face excessive shelter burdens, unaffordable shelter costs create problems for the community as well:

- o They cause homelessness;⁷³
- o They cause "forced mobility" with its attendant problems;⁷⁴

70. The numbers are imprecise and should be discounted to the extent that there is a mismatch of data. The low-income elderly population, for example, is measured in persons, while the LIHEAP population is measured in households. The low-income elderly population involves an upper limit of at or below 100 percent of Poverty, while the LIHEAP population is at or below 150 percent of Poverty. If the ratios were close, these mismatches might be significant. Given the strength of the ratio, however, the mismatches are disclosed, but the analysis is presented in any event.

71. Energy "burdens" represent bills as a percentage of income.

72. Colorado now targets based on home *heating* costs, not total home energy costs.

73. One study of homelessness found that nearly ten percent of the homeless cited utility shutoffs as a primary cause of their situation. Northern Kentucky Coalition for the Homeless (with technical assistance by Applied Information Resources), *Homelessness and Low-Cost Housing in Northern Kentucky: An Analysis and a Strategic Action Plan* (July 1990).

- o They cause health and safety problems;
- o They cause housing abandonment.⁷⁵

And, of course, from the perspective of a utility, these unaffordable shelter costs cause nonpayment, resulting in both increased expenses and decreased revenue. Households who are paying, on average, 15 - 25 percent of their income for home energy bills alone will have no chance of keeping total shelter costs within the affordable 30 percent range.

To gain some insight into the performance of LIHEAP in targeting households with high shelter burdens, this analysis uses the same basic concepts as described above without employing precisely the same methodology.⁷⁶ In this consideration, what we seek to find is whether the percentage of households served by LIHEAP is equal to or greater than the percentage of households with high shelter cost burdens. If LIHEAP participation is consistently lower, then we can conclude that LIHEAP is not proportionately serving households with high shelter costs. Given the demonstrated relationship between high energy costs and high shelter costs, this failure should be of concern.

Table E-8 presents the analysis. As this Table shows, while the number of households at from 0 to 30 percent of HUD Adjusted Median Income (HAMFI) who have "high" shelter burdens (*i.e.*, above 30 percent) is routinely in the range of 40 to 60 percent of the population, the number of households who are of roughly the same low incomes and who are served by LIHEAP is routinely in the range of 15 to 30 percent of the population. As the Table shows further, neither does the proportion of the population served by LIHEAP bear any relationship to the proportion of households with extremely high shelter burdens (*i.e.*, shelter burdens exceeding 50 percent of income). Finally, as Table E-8 shows, merely because a county has a population which bears a high (or extremely high) shelter burdens does not mean that that county will have greater proportion of its population receiving fuel assistance.

While LIHEAP is certainly not designed to remedy the housing affordability problems of Colorado, there should be *some* relationship between shelter affordability and LIHEAP. Even though no other state to date has done so, given the *lack* of such a relationship, in developing future measures of LIHEAP performance in

(..continued)

74. One study of forced mobility found that frequent mobility results in significant educational problems for low-income children and, in addition, that a substantial number of the frequently mobile households cited unaffordable home energy bills as the cause of their mobility. Roger Colton, *A Road Oft Taken: Unaffordable Home Energy Bills, Forced Mobility And Childhood Education in Missouri*, Fisher, Sheehan & Colton, Public Finance and General Economics: Belmont, MA (1995).
75. Energy Coordinating Committee and Institute for Public Policy Studies of Temple University, *An Examination of the Relationship Between Utility Terminations, Housing Abandonment and Homelessness* (June 1991).
76. There simply is not a close enough match in data to meaningfully employ the same methodology. For example, households high shelter cost are reported for median income households but not Poverty Level. LIHEAP participation is reported for Poverty Level but not median income. Nonetheless, there is a high overlap in populations (*e.g.*, between households at or below 150 percent of Poverty and households at or below 50 percent median income). Fifty percent of median income is generally considered to be roughly 200 percent of Poverty. Hence, it would be instructive to compare the two populations at least qualitatively.

Colorado, this failure should be examined in greater detail and rectified.

Again, it is conceded that "shelter burdens" and "energy burdens" are certainly not synonymous. However, since energy costs are included within the definition of shelter costs, there is a strong relationship between high energy burdens and high shelter burdens. Given the necessary relationship between energy and shelter costs, it would seem there should be some relationship between households with high shelter burdens and LIHEAP participation. LIHEAP may be viewed, in other words, not simply as a stand-alone energy assistance program, but as part of a larger shelter affordability initiative. While shelter affordability and energy affordability are not one and the same, they are certainly closely related.⁷⁷

TARGETING THE "POOREST OF THE POOR"

A final inquiry into Colorado's LIHEAP targeting examines whether LIHEAP benefits tend to go to the "poorest of the poor." This population is defined to be the population of households who have annual incomes of \$5,000 or less.⁷⁸

As Table E-9 demonstrates, the state as a whole succeeds in targeting LIHEAP benefits to households with incomes at or below \$5,000. Using the performance review methodology outlined above, any figure developed by the calculation which is greater than 1.0 means that a greater proportion of those served were vulnerable than in the total population. The state's total performance ratio is an acceptable 1.1.

This statewide average, however, masks the performance of LIHEAP in numerous individual counties. Of the 63 counties in Colorado, 21 experienced performance measures of less than 1.0. An additional 11 counties experienced a targeting ratio of exactly 1.0. As can thus be seen, nearly half of all Colorado counties either performed below par or at a marginally successful level.

The importance of adequately serving these lowest income households is difficult to overstate. These households will tend to have the highest energy burdens. In addition, they will likely have the least ability to reduce their energy burdens since almost *any* energy bill will be unaffordable. Even if these households consumed energy at the maximum potential efficiency, in other words, it is not only possible, but likely, that their bills will remain unaffordable. As a result, these are the households who are most in need of cash benefits through an energy assistance program.

SUMMARY

Increasing consensus is emerging that performance measures should be applied to the study of the administration of public benefits programs rather than simply measures of outputs and resources. During the fall of 1995, the federal government has promulgated draft performance measures to use in evaluating a state's LIHEAP program. Performance is to be gauged by reference to the impact of LIHEAP in helping to make energy more affordable for the target population as well as by reference to the success of LIHEAP in targeting vulnerable populations.

77. This conclusion may have significance for funding sources as well as for strategic partnerships in delivering energy assistance benefits to the vulnerable populations.

78. A more precise definition of low-income is not possible. Census data is not disaggregated for incomes below \$5,000. Hence, for example, data for the total population of households with incomes of \$0 to \$2,000 is not available.

As is found above, the Colorado LIHEAP program is insufficiently funded even to attempt to make total home energy affordable for low-income Colorado residents. Given existing resources, any effort which may be made to address total year round home energy burdens is likely instead only to dilute the available resources so as to make the program ineffective overall. If a focus is kept on home heating bills, however, the program can improve its efforts to address affordability by increasing the period during which heating bills are considered to include the shoulder months of October and May. Even this recommendation, however, may be unmanageable in light of recent federal funding cutbacks. Deep cutbacks in federal dollars have resulted in reduced, not expanded, benefits as well as a reduction in the number of months the program operates.

From a targeting perspective, on the one hand, Colorado does an excellent job of targeting assistance to households with elderly members. Insufficient data exists to calculate a performance measure for households with children or households with disabled members. On the other hand, there is little targeting based on high shelter burdens (standing as a surrogate for high energy burdens). Again, it is difficult to separate total home energy from home heating. This lack of targeting, therefore, may simply reflect the lack of adequate resources. Recent budget realities have forced LIHEAP to reduce, rather than to expand, benefits. Changing the targeting mechanism from one based on heating to one based on total home energy would depend upon a permanent source of supplemental funding for fuel assistance.

CHAPTER 8: INNOVATIONS IN FUEL ASSISTANCE AROUND THE COUNTRY

Given the expense associated with making low-income energy burdens affordable, combined with existing and pending cutbacks in federal fuel assistance funding, it is important for Colorado to emulate successful models of fuel assistance from around the nation. These models should involve more than mere innovations in the distribution of existing LIHEAP dollars, but should rather look at a variety of tried and untried government and non-government endeavors. The discussion below reviews a variety of initiatives to glean lessons for possible Colorado application. Seven different types of innovations are discussed.⁷⁹ A detailed discussion of utility programs is set aside pending completion of an evaluation of the Percentage of Income Plan (PIP) and Percentage of Bill Plan (POB) by Public Service Company of Colorado.

UTILITY-BASED PROGRAMS

Perhaps the most important low-income fuel assistance program structure outside LIHEAP and federal subsidized housing utility allowances involves the delivery of rate discounts through public utilities. While clearly not all low-income Colorado households use utility fuels such as natural gas and electricity as their primary heating source, nonetheless, the existence of electricity is nearly universal and the combination of gas and electricity heating covers *nearly* all (95%) low-income Colorado residents. A variety of program designs, target populations, and justifications exist for the utility programs which exist around the nation.

The Pennsylvania Customer Assistance Programs (CAPs) represent the most comprehensive

79. If the discussion below seems heavily oriented toward bulk fuel programs, that is intentional. The generation and delivery of additional benefits to bulk fuel customers is the "hard" issue, the solution to which perhaps deserves disproportionate attention.

statewide trial effort on the part of utilities to address the payment problems of low-income households. Under the 1990 Pennsylvania Public Utility Commission (PUC) order directing the establishment of CAPs by both electric and gas utilities, affordable rate programs were to be designed directed toward income-eligible households with a negative ability-to-pay.

The Pennsylvania CAP programs were directed to be implemented by a 1992 Pennsylvania Public Utility Commission order. That order, titled *Policy Statement on Customer Assistance Program (CAP)*,⁸⁰ found that "CAPs provide alternatives to traditional collection methods for low-income, payment troubled customers. Generally, customers enrolled in a CAP agree to make monthly payments based on household family size and gross income. These regular monthly payments, which may be for an amount that is less than the current bill, are made in exchange for continued provision of utility service." The PUC concluded: "as a result of our investigation, the Commission believes that an appropriately designed and well implemented CAP, as an integrated part of a company's rate structure, is in the public interest. . . These guidelines prescribe a model CAP which is designed to be a more cost effective approach for dealing with issues of customer inability to pay than are traditional collection methods."

Importantly, the Pennsylvania CAPs are not directed toward all low-income households. Instead, according to the Pennsylvania PUC's *Policy Statement*, to be eligible for CAP, a customer must live at or below 150 percent of the federal Poverty Level *and* be a "negative ability to pay" customer. A "negative ability to pay customer" is defined as a low-income customer "whose financial condition is such that expenses exceed income as determined through consideration of appropriate factors" defined by the Commission.

According to the Pennsylvania Public Utility Commission (PUC) staff, initial evaluations of the various CAP programs have not yet been completed. Nonetheless, Equitable Gas has an evaluation which, as of November 20, 1995, was "imminent" and Pennsylvania Power and Light (PP&L) has "preliminary" data on which that company is willing to rely. According to the PUC staff, PP&L found that participants in their CAP did *not* increase usage in response to the reduced price for energy. In addition, and more importantly, PP&L found that winter payments from CAP participants increased from forty percent (40%) the year before the program to 86 percent in the first year of the program. Of 815 participants, PP&L found, 326 had made four or more winter payments (October - March) in the 1993/1994 heating season (pre-program) while 700 made four or more payments during the 1994/1995 winter season (while on the program). Finally, PP&L found that few CAP participants failed to make their required payments. Of the 1700 participants, the PUC staff reported, only 84 were defaulted for nonpayment during the first 15 months of the program.

In addition to the Equitable Gas evaluation which is to be completed by the end of 1995, the PUC staff reported that from four to five additional evaluations of that state's CAP programs

80. Docket M-00920345 (July 2, 1992).

are scheduled to be completed in the first six months of 1996.

UTILITY RATE DESIGN INITIATIVES

Not all utility programs must be considered low-income affordable rate programs. Some utilities have simply adopted rate designs that are either explicitly or implicitly directed toward providing energy assistance to low-income households. The difference between a rate design initiative and an affordable rate program is that rate designs represent decisions based on differing methods of cost allocation rather than program decisions based on income considerations. Similar policy purposes can be pursued through either rate design initiatives or affordable rate programs. The distinction lies largely with the underlying justification of the prices ultimately approved.

The "economy residential service" (ERS) rate adopted by Central Power and Light Company (Corpus Christi) is one such rate design initiative. The ERS tariff is not a rate targeted low-income households. Instead, the ERS rate is available to all individually metered units that are used for primary residential use; second homes, in other words, are not covered by the tariff. The tariff provides that existing customers will be eligible for the ERS rate only if during the past twelve months, the consumption for those customers has been 500 kWh or less.⁸¹ New customers must certify/verify that their highest monthly usage will be 500 kWh or less.⁸²

During any consecutive twelve month period, a customer receiving the ERS service will be allowed two months of usage in excess of 500 kWh. In addition, the customer will be allowed one month of usage in excess of 600 kWh per month. According to the Company, if the customer exceeds either of these limits, the customer will automatically be billed on the normal residential rate for the current month and the next twelve consecutive months before being eligible again for the ERS rate.

One of the primary purposes of CP&L's ERS rate was to deliver rate benefits to low-income, low-use customers. The use of the 500 kWh cut-off was intended to be a surrogate for low-income households.

In contrast, the winter heating discount provided by Washington Gas Light Company (serving Washington D.C.) is called the Residential Essential Services (RES) rate. In August, 1995, the D.C. Public Service Commission (PSC) approved three significant modifications to the current RES discount rate. As modified, the RES rate: (1) provides a larger discount for poorer participants; (2) concentrates the discount in the coldest winter

81. Customers who have been connected for less than twelve months have their eligibility based on the historical usage at their current location.

82. If the month is longer than 30 days, a customer is allowed 16.67 kWh of use per day.

months; and (3) devotes more overall resources to subsidizing RES customers. Unlike the Texas rate, while consumption-based to some extent, the RES rate is limited only to low-income households.

As modified, the RES rate varies the discount depending upon the income and size of the household. A qualifying household subsisting at a relatively low percentage of the federal poverty level (*i.e.*, whose income is very low relative to household size) obtains a higher discount than a qualifying household whose income relative to household size is higher. Specifically, households subsisting on incomes between 0 and 50 percent of the federal Poverty Level are entitled to a 21.01 cents (25 percent) per therm discount on their commodity charge; a discount of 16.81 cents (20 percent) per therm applies to participating households living between 51 and 100 percent of the federal Poverty Level; and participating households whose incomes are between 101 and 150 percent of the federal Poverty Level are entitled to a discount of 15.78 cents per therm. By adjusting the discount on the basis of household income and size, the modified RES rate recognizes that all qualifying customers are not equally able to pay the cost of gas service and affords greater benefits to those customers less able to pay. The D.C. PSC established a total cap of \$1.2 million as the cost of the RES program.

The modifications to the RES rate also improve the RES rate by tending to level the gas heating payments of participating households during the winter heating season. Under the modified rate, a participating gas customer benefits from the appropriate discount for the first 75 therms of gas usage during the lowest winter demand months of November and April, the first 175 therms of usage during the significant demand months of December and March, and for the first 200 therms of usage during the highest demand months of January and February. Unlike the Texas rate, however, if usage exceeds the cap in D.C., the loss of the discount applies only to the excess usage over the cap, not to the entire amount.

The Texas and D.C. rate design proposals are significant in that they seek to deliver energy assistance through application of normal rate design. They do not explicitly set rates based on income or percentage of income burdens, although the D.C. rate has a discount which varies based on the Poverty Level of the rate participant. They do not rely upon LIHEAP nor do they seek a cost justification based on any economic analysis that the savings generated by the rate exceed the amount of the discount. Their emulation deserves consideration.

BULK FUEL VENDOR PROGRAMS

As is noted in other parts of this report, while 95 percent of low-income Colorado residents heat with natural gas or electricity, it would nonetheless be inequitable to a substantial portion of Colorado's low-income population to focus attention *exclusively* on utility assistance programs. Some counties, in other words, have a very high penetration rate of fuels other than natural gas, yet have insufficient numbers of households overall to affect the

statewide average. Thus, for example, Archuleta County has 43.1 percent of its residents who use LP gas; Archuleta County, however, has only 1,100 households overall. Elbert County, too, has 57.3 percent of its residents who use LP gas; it, however, has only 2,800 households overall. LP gas is used by more than 30 percent of the population in 20 counties in Colorado, and used by more than 20 percent of the population in an *additional* 12 more counties. A reasonable review of innovations in fuel assistance must thus examine bulk fuel programs.

While most programs that deal with delivering financial assistance to bulk fuel customers have arisen in states concerned with fuel oil energy burdens, the lessons learned from such programs can provide important insights to what would be Colorado's focus instead on propane users. The attention being devoted to bulk fuels is large around the nation and getting larger. According to the National Center for Appropriate Technology (NCAT), during FY 1991, in the first year of the LIHEAP "leveraging incentive" program, seven states leveraged nearly \$2 million dollars in bulk fuel discounts, credits or donations. By the end of FY 1993, however, three years into the leveraging incentive program, the amount leveraged had increased to \$6.8 million in at least 15 states.⁸³

At present, the Colorado LIHEAP program does nothing in particular for users of bulk fuels other than the 60 day no shutoff provision contained in all vendor contracts.⁸⁴ Five basic types of bulk fuel programs exist that might apply to Colorado's low-income population which relies on propane for heating. Each of these will be examined in turn. These include:

- o A negotiated agreement to provide fuel at the cash price rather than the credit price for LIHEAP recipients;
- o A negotiated across-the-board percentage discount on bulk fuel purchases by LIHEAP recipients;
- o A fixed "margin over rack" program;
- o A "summer fill" program; and
- o Winter protections for bulk fuel vendors, without additional financial assistance.

Cash Rather than Credit Prices

83. These figures are somewhat misleading since \$4.0 million of that \$6.8 million came from three states: Massachusetts, Connecticut and Maine.

84. This 60-day hold provision is available to all LIHEAP recipients, including users of bulk fuels and users of electricity and natural gas.

One primary method of providing "discounts" to users of bulk fuels is to negotiate an agreement for vendors to provide the "cash" price of the fuel rather than the credit price. In most instances, if cash is not received at the time of delivery, a surcharge is added to the price of the fuel on a per gallon basis.

Maine and New Hampshire both have an agreement by fuel oil dealers to provide the cash price rather than the credit price to LIHEAP recipients. According to Maine LIHEAP officials, this agreement results in a savings of from eight to twelve cents per gallon. Indeed, in 1992, Maine claimed \$2 million in savings from this provision while in 1993 the total was \$1.3 million. New Hampshire's experience is similar. According to the state LIHEAP office, the statewide discount based on cash prices generates an average savings of roughly 10 cents per gallon. New Hampshire claimed \$308,989 in leveraged funds through this mechanism in 1992 and \$345,000 in 1993.

The Maine cash price program arose out of a controversy surrounding efforts by the state LIHEAP agency to recapture interest from oil vendors on advance LIHEAP payments in FY 1987. Maine's 1987 LIHEAP State Plan incorporated a provision calling for the payment by fuel oil vendors of interest on the unused portion of LIHEAP payments.⁸⁵ The Maine State Plan provided for two alternative interest payment mechanisms. The payment was either: (1) to be credited to the household account on a monthly basis; or (2) to be made to the local LIHEAP provider at the end of the program year. The Maine Oil Dealers Association (MODA), however, strenuously objected to the interest recapture provision. When the 1986 elections brought a change of governors, the interest provision was rescinded.

South Dakota's LIHEAP program, also, has negotiated for fuel oil vendors to provide the cash price to LIHEAP recipients.

Across-the-Board Percentage Discounts

Maryland is one of the leading states in providing percentage discounts for LIHEAP recipients who are users of bulk fuels. In Maryland, the LIHEAP program has contracted to provide a three percent (3%) discount off of the best residential price to non-LIHEAP customers. According to Maryland LIHEAP officials, the percentage discount results in more savings for low-income households when prices go up, but does not adversely affect the dealer when prices go down.

85. In FY 1986, nearly three of every ten LIHEAP fuel oil households still had a credit balance on June 1, 1986. Of those customers, roughly eight of ten had balances greater than \$100; almost five of ten had balances greater than \$125, and more than one in five had balances of more than \$150. A full one in ten of the fuel oil accounts having credit balances had balances of greater than \$200 at the end of the heating season.

The percentage discount generates several hundreds of thousands of dollars of additional resources each year. The state claimed \$227,000 from the discount in 1991, \$237,544 in 1992 and \$189,000 in 1993.

The Maryland discount was obtained in exchange for quicker payment of LIHEAP benefits by the state. According to one Maryland LIHEAP official, the state attorney general's office had ruled in the late 1980s that state law governing procurements prohibited state funds from being paid to fuel oil vendors in advance of the actual delivery of the goods or services being purchased. In response to this ruling, legislation was successfully enacted allowing LIHEAP to pay for bulk fuels in advance of delivery. In exchange for this legislation, however, fuel oil vendors agreed to provide a three cent per gallon discount to LIHEAP recipients. Due to the difficulty in administering this program in the first year, however, in the second year, the three cent per gallon discount was changed to three percent. The three percent discount has an ease of administration. When a fuel oil vendor delivers \$100 worth of fuel, for example, that vendor receives a \$97 payment from LIHEAP.

Care must be taken in defining the "best price" available within the context of this program. Many vendors, according to LIHEAP officials, vary their prices not only by the date of delivery (responding to changes in wholesale prices), but according to the amount of the fill-up as well. Hence, for example, a person receiving 50 gallons of fuel may be charged one price while a customer who receives 200 gallons of fuel may be charged a substantially lower price. The difference can be as much as 15 to 20 percent, according to the LIHEAP office.

Having said that, however, it is not clear that it is always in the best interests of a low-income customer to receive sufficient LIHEAP funds at one time to pay for a complete fill-up of a bulk fuel tank, despite the lower prices. If a LIHEAP customer receives a \$200 payment toward his or her fuel bill, LIHEAP officials said, that customer often makes no household contribution toward that particular delivery. When the fuel subsequently runs out, the customer is left with another \$200 bill with an inability to pay. In contrast, if a household is provided with a \$100 payment toward his or her fuel bill, the customer often can match that payment with \$100 in household funds. When the fuel runs out, a second \$100 LIHEAP payment can again be matched with household funds. The LIHEAP benefit, in this case, serves not only to provide a cash supplement to the recipient, but serves a bill-leveiling function as well.

The purpose of this discussion is not to suggest a fuel oil discount program for Colorado. The 1992 price of fuel oil in Colorado was \$4.82 per million Btu, competitive with the natural gas price of \$4.46 per million Btu. Moreover, the number of low-income households using fuel oil both statewide and in each particular county is negligible. However, the Maryland bulk fuel discount is not limited simply to fuel oil, but is applicable to propane as well as to coal and wood vendors. As can be seen, therefore, the programs discussed above have their applicability in Colorado with regards to propane usage.

Margin Over Rack (MOR) Programs

One established mechanism for delivering additional fuel assistance benefits to low-income households is to establish a "margin over rack" (MOR) program. Two states, Massachusetts and Connecticut, have statewide MOR programs for fuel oil. The question is whether the fuel oil experience is transferrable to propane such as is relied upon in Colorado.

Since 1991, Massachusetts has had a statewide Margin over Rack program. The program pays oil dealers the lesser of either a set margin of \$0.25 per gallon or their regular retail price on the date of delivery. The Massachusetts MOR program allows all oil vendors to participate. The MOR program saved LIHEAP recipients almost 9.5 cents per gallon during the 1993 winter months.

The MOR concept is predicated on the fact that oil vendors base their per gallon retail price on a margin added to their terminal or "rack" price. Each vendor's margin is different due to variances in operating costs associated with delivery of the product. According to national LIHEAP officials, in negotiating for its discount programs, Massachusetts officials pointed out that the average vendor's business from LIHEAP clients is small; approximately three percent of the state's residential oil consumption is by LIHEAP clients. Countering oil industry arguments, the state maintained that while the volume was significant enough to warrant some form of discount for LIHEAP recipients, the discount would not result in significant across-the-board price increases for the entire customer base.

Like Massachusetts, Connecticut's statewide fixed margin program pays a predetermined amount --25 cents-- over the wholesale price of fuel oil for resale to LIHEAP recipients. The program pays participating vendors the margin price or their retail price, whichever is lower. During FY 1993, the first year of operations, the Connecticut LIHEAP agency found it generated nearly \$1.0 million in savings through its MOR program. The average statewide retail price was \$0.915, while the average fixed margin price was \$0.838, an average savings of \$0.077 per gallon. Like Massachusetts, Connecticut estimates that each vendor's LIHEAP customer base is a small part of their total business, between one and four percent, or about 2.7 percent of the state's total residential fuel oil sales.

A fixed margin over rack program has not been extended to propane fuel in these two New England states. This may well be, however, simply because propane does not represent a significant heating fuel in the states. Colorado, on the other hand, relies extensively upon propane for low-income heating.

The primary issue is the availability of a "rack" price for the Denver area for propane. The term "rack" refers to the loading station where rail cars or other carriers are filled with the product. It is a general petroleum industry term and is used to refer to propane as well as to

fuel oil. Rack prices are "FOB refinery";⁸⁶ the term is refinery-specific, though due to the impact of competition, the rack prices quoted by refineries in the same area will usually be close --though perhaps not identical-- on a daily basis.

There are at least three major propane "producers" in the Denver area: Diamond Shamrock, Phillips, and Associated (Greeley). The 100+ propane dealers in Colorado will likely purchase their propane from these producers. The "FOB refinery" term means that the propane will be shipped from the refinery, but the propane vendor must bear the responsibility, and the cost, of providing transportation for the propane to the vendor's place of business.⁸⁷

All three producers "post" rack prices. Posting is the term used in the industry for publishing or making known rack prices. While industry officials say it is unlikely that refineries would release rack prices to a non-buyer, such prices *are* released routinely to buyers and publications. The *Butane/Propane Newsletter*, a weekly publication located in Arcadia, California posts propane prices for various areas around the country including Denver. In addition, while the *OPIS: Oil Price Information Service*, a weekly publication located in Rockville, Maryland, does not *post* propane prices in its publication, the same company's online service *PetroScan* will provide propane "rack" prices upon request (for the nominal fee of \$25 per request).

In sum, rack prices for the several producers in the Denver area are available and will generally be close to one another. It should be a simple matter to take an average of the three on a week-by-week basis as the foundation for a LIHEAP margin over rack program for Colorado propane customers. Given these observations, a propane-based margin over rack program in Colorado deserves consideration.

"Summer Fill" Program

One mechanism that some states have used in an effort to stretch their bulk fuel dollars somewhat further is to implement a "summer fill" program. South Dakota has implemented such a program. Under this program, the state processed applications for summer fills for the elderly, and negotiated with suppliers to charge the summer price. Nonetheless, the vendors agreed to bill after October 1st so as to apply LIHEAP payments against the fuel charge. According to South Dakota LIHEAP officials, the summer fill program averaged a

86. The term "FOB refinery" is a legal shorthand generally indicating that the contract requires the seller to deliver the goods at a particular location other than the buyer's place of business.

87. A common use of the term is "FOB seller's plant" or "FOB seller's city." This would mean that the propane wholesaler would be required to place the propane in the hands of a carrier at the location of the wholesaler's facilities, but the vendor would bear both the responsibility and the cost of transportation.

statewide savings of 15.6 percent for fuel oil LIHEAP recipients and a 9.33 percent savings for households heating with propane.

The South Dakota program is similar to the model proposed for the Connecticut LIHEAP program in 1992.⁸⁸ The thesis of the Connecticut proposal was that that state's LIHEAP program should be able to take advantage, to some limited degree,⁸⁹ of the seasonal differential in fuel oil prices. Indeed, the purchase of some significant portion of Connecticut's LIHEAP fuel oil needs during the summer months rather than during the winter months would permit the state to, in effect, deliver more benefits to households for the same amount of money.

The Connecticut proposal was for the state to make one initial *summer* purchase and delivery of \$200 of fuel oil to each household having received fuel oil benefits in the immediately preceding LIHEAP heating season. This assumes the average tank fill-up is roughly 200 gallons. While the purchase and delivery would be during the month of August, the intent was to have this delivery be a "prepayment" for November, the first oil delivery of the heating season. Since oil is generally a heating fuel, not used also for cooking, hot water and the like, an August fill-up would still provide the heating season benefits for which LIHEAP is intended.

According to the Connecticut proposal:

There should be little opposition to such a program from fuel oil dealers. The lower price per gallon of fuel does not in any way affect the profit that these dealers would receive from LIHEAP fuel oil purchases. In seven of the eight years between the 1984-1985 program year and the 1991-1992 program year, the highest margins were generated by fuel oil dealers in either the months of February or March, months not likely to be affected by the summer pre-purchase program. Indeed, the month of November --the month where LIHEAP deliveries would be displaced-- is generally a month during which some of the lowest margins over wholesale are realized.

Calculations in Connecticut, using historical data, found that providing an August fill of 200 gallons would have saved the state LIHEAP program nearly 11 percent over fall and winter fuel oil prices.⁹⁰

88. Due to a reorganization of Connecticut state government after a gubernatorial election, including a reorganization of fuel assistance and social services, no suggestions for LIHEAP leveraging were implemented in Connecticut.

89. With the "limit" being one fuel oil fill-up.

90. Unlike South Dakota, no analysis was performed for propane in Connecticut since propane was not a significant heating fuel in that state.

Winter Protections for Bulk Fuel Customers

"Fuel assistance" for low-income users of bulk fuels need not necessarily take the form of financial assistance. At least two states have adopted proposals that certain winter practices by vendors who sell bulk fuels to residential customers be prohibited pursuant to state consumer protection statutes. Administrative regulations adopted in New York and Maine prohibit the denial of service during cold weather months, during which months such denial may pose a threat to the health, safety and life of the customer.

In 1993, the New York State Energy Office promulgated regulations governing procedures heating fuel dealers must follow before cutting off service to a household. The regulations cover heating oil, bottled propane gas, kerosene, coal and wood, whichever is the home's primary heating fuel. They are in effect from November 1 to April 15 of each year.

For customers who receive fuel on an automatic delivery basis, dealers must attempt to notify the customer both in writing and by telephone at least three days before a cutoff. In contrast, customers who call the dealer when a delivery is needed must be notified of a cut-off when a request for fuel is made.

In both cases, the dealer must ask if the customer is out of fuel, is in need of alternative shelter, and whether the customer wishes to have a previously-identified third party notified of the cut-off. Heating fuel dealers are required to notify the state Department of Social Services whenever:

- o the health or safety of the customer is endangered by the cut-off and the customer cannot obtain fuel from another source or cannot find alternative shelter;
- o the dealer is unable to notify the customer by telephone of the fuel cut-off; or
- o the cut-off involves a multi-family dwelling of three or more units.

In a similar fashion, the Maine Unfair Trade Practices Act Regulations on "Sale of Residential Heating Oil" apply to heating sales from October 15 through April 30 of each year. Under these regulations, dealers must sell fuel within their service areas to anyone who pays cash, even if the customer has not paid for a previous delivery, or is not an established customer. Likewise, fuel must be delivered if a government agency (or a fuel assistance sub-grantee) guarantees payment.

Finally, the Vermont attorney general has adopted regulations pursuant to the state's Unfair and Deceptive Acts and Practices (UDAP) statute specifically governing the sale of propane for heating purposes. These Vermont regulations govern the notice prior to disconnection,

repayment agreements, minimum deliveries and similar issues. Simply because vendors of bulk fuels are "unregulated" by the state public utilities commission, in other words, does not mean that such vendors must be unregulated in their entirety. Other means exist and have been utilized in other states.

As an aside, regulatory restrictions on the winter disconnection of service should be considered for users of natural gas and electricity as well. Winter restrictions are common regulatory practices designed to protect households from the harms of losing utility services during the cold winter months. According to the U.S. Department of Health and Human Services (HHS),⁹¹ "a 'winter restriction' is any procedure, which is not observed year-round, that offers additional protection to households threatened with service termination. Winter restrictions range from an outright seasonal ban on utility termination to the offer of a payment extension prior to termination." HHS found that "such restrictions offer low income customers protection against utility termination during winter months and, in some cases, guarantee winter service even if no utility payments are made during the winter months."⁹²

Winter restrictions are commonplace around the country today. HHS found that 76 percent of all state regulatory utility commissions require some form of winter restriction. In addition, four percent of the commissions report that *most* utility companies observe winter restrictions, and 14 percent report that *some* utility companies do. Only six percent of the commissions report that winter restrictions are observed by *no* companies in their jurisdiction.

Even more importantly, HHS said, is the coverage of the winter restrictions. "When considering population-weighted data," HHS found, "the *percent* of people covered by required winter restrictions rises from 76 percent to 84 percent."

Different types of restrictions apply in different states. On the one hand, some regulatory commissions impose "date-based moratoria." This type of protection guarantees service during specified time periods of the year. Similarly, some commissions do not impose absolute moratoria, but require commission approval prior to any winter termination of service. Under this approach, proposed service terminations are reviewed on a case-by-case basis. On the other hand, there are "temperature based moratoria." This type of protection protects against service termination so long as temperatures remain above a certain designated point.⁹³ As HHS notes, this restriction is less strict than date-based protections,

91. U.S. Department of Health and Human Services, Office of Families and Children, *FY 1990 LIHEAP Report to Congress*, at 153 - 162 (Sept. 1991).

92. *Id.*, at 153.

93. According to HHS, temperature protections can be either explicit (*e.g.*, no service terminations while temperature below 32 degrees) or non-explicit (*e.g.*, no service terminations during "bitterly cold

since the policy only delays service terminations until the temperature rises above the designated temperature. Moreover, the policy does not require the reconnection of customers whose service was disconnected during temporarily warm weather.

HHS reports that roughly one-third (32 percent) of all states have date-based winter shutoff moratoria, roughly 14 percent have explicit temperature-based moratoria, and roughly 28 percent have non-explicit temperature-based moratoria. HHS reports the purpose behind the winter protections:

* * *date-based moratoria utilize a winter time frame as a proxy for freezing temperatures. Customers who are continuously protected from disconnection during the winter are considerably less likely to be exposed to freezing home temperatures than are those whose service is protected only when the temperature is predicted to drop to a certain level.⁹⁴

One objection to winter shutoff restrictions is that they create an incentive for customers not to pay during the winter months, knowing that their nonpayment cannot result in the loss of service. Only one study, however, has examined this issue empirically. That study by the staff of the Pennsylvania Public Utilities Commission concluded that winter shutoff restrictions have no impact on winter payment patterns.⁹⁵

In sum, winter shutoff restrictions in Colorado are appropriate, and should be considered for, not only vendors of bulk fuels but for regulated utilities as well.

NON-LIHEAP-BASED DIRECT VENDOR PROGRAMS

The pursuit of non-LIHEAP-based direct vendor programs is one means through which both utilities and low-income households might benefit. Through a direct vendor program, in exchange for consideration, a low-income household agrees that a public benefit to which the household is entitled to receive unrestricted cash is instead earmarked for payment to the utility and paid directly to that company. Direct vendor payment programs, of course, can be developed for bulk fuel vendors as well; they are not uniquely suited to utilities.

(..continued)

weather").

94. *Id.*, at 156.

95. Bureau of Consumer Services (1983). *Utility Payment Problems: The Measurement and Evaluation of Responses to Customer Nonpayment*, at 19, Pennsylvania Public Utilities Commission: Harrisburg, PA. ("...if the assertion that winter termination restraints invite nonpayment were correct, then non-heating arrearages should show the same seasonal pattern of variation as do heating arrearages. That they do not casts substantial doubt on the assertion that PUC winter termination restraints are responsible for willful non-payment and consequent collections problems.")

Direct vendor payment programs are not without precedent in Colorado. Indeed, LIHEAP benefits, themselves, are now distributed through direct vendor payments in the state. In addition, as part of the "vendor contract" through which the state agrees to make the direct vendor LIHEAP payment, the state has negotiated some consumer protections. The 60-day hold provision discussed elsewhere in this report is one such protection. This discussion, however, does not examine the direct vendor payment of LIHEAP benefits, but rather of other types of public assistance.

A utility should offer some payment to gain the participation of low-income households in a direct vendor payment program. This payment would be necessary since a refusal to enter into a direct vendor program would retain for the household the greatest discretion and control over its entire month-to-month allocation of household resources. Without such participation, in other words, the household retains the discretion to divert the public assistance to uses such as food and clothing in low-bill months. The payment to be made by the utility to gain participation in a direct vendoring program should be a commitment to forgive the "excess" bill over the direct vendor payment. The treatment is justified. In the direct vendor payment program, the household cedes all discretion over the use of the utility payment. The forgiveness should be as automatic as the payment.

Direct vendor programs around the country, which are not common, involve both AFDC and subsidized housing benefits.

AFDC Payments

The direct vendor payment of certain AFDC payments is one means by which states may expand total fuel assistance dollars. Michigan's Positive Billing Program is one such program tied into AFDC benefits. Since the program was implemented in Michigan, however, it has undergone major changes over the years. According to state LIHEAP officials, utilities have become stricter in their requirements for Positive Billing participants.

Under Positive Billing, the state AFDC office agrees to provide a direct vendor payment to utilities out of a household's AFDC benefit. The size of the payment can fall within a certain range: from five to seven percent for electric; from 11 to 15 percent for heating. The precise part of the AFDC check which is vendored depends upon the annual usage of the client. If the household has higher usage, the vendor payment is placed at the higher end of the range. If the household has lower usage, the payment is placed at the lower end. Even though AFDC is a flat grant in Michigan, the direct vendor portion is based on the amount of the flat AFDC grant which is *assumed* to be provided for energy services.

After a client is enrolled in the program, the utility then directly bills the Department for the client's energy usage. The Department pays those bills out of two fund sources. The first source is the withheld portion of the AFDC payment. If that payment is insufficient to cover the bill, the Department then pays an amount up to the maximum crisis assistance payment.

In exchange for the direct vendor payment, the participating client is provided protection against termination of service for nonpayment of bills, even if the payment received from the state is insufficient to cover the entire utility bill. Utilities, however, have the right to refuse a household's participation in Positive Billing if the household consumption is too high.

The Positive Billing Program also involves an arrearage vendoring from the AFDC payment. A payment of 2.5 percent of the client's AFDC payment standard may be required for electric non-heating customers; while a payment of five percent of the client's payment standard may be required for all electric customers. Service to a client may not be terminated so long as the client remains active in the program.

Utility Allowances in Assisted Housing

A program involving utility allowances provided to residents of assisted housing is a second type of direct vendor payment program that may be available to assist low-income customers. The concept of the program is that the utility will pay an "incentive" for residents of assisted housing to participate in the direct vendor program. The incentive to be paid to gain participation in a direct vendoring program should be a commitment to forgive the "excess" bill over the utility allowance.

The crux of the Section 8 program is the provision of a housing subsidy that reduces the shelter costs of such households to 30 percent of the household's income. The shelter subsidy is paid directly to landlords. Nonetheless, the subsidy includes a "utility allowance" that is at least purportedly designed to pay the household's actual utility expenses. Despite the federal subsidy, however, the household purchases utility service directly from the energy vendor and remains personally responsible to the utility for bill payment. Direct vendor payments are not generally made.

If Section 8 utility allowances are *inaccurate*, the utilities serving Section 8 households will likely experience a shortfall in payments for the affected households. Accordingly, just as public utilities have an interest in ensuring that LIHEAP payments are sufficient (and accurate), public utilities have an interest, also, in ensuring that Section 8 utility allowances are accurate (and sufficient).

In general, several reasons support a utility's decision to forgive the amount of the annual bill which exceeds the annual Section 8 household's utility payment as an incentive to gain participation:

1. The excess bill over the utility allowance will push the household's shelter costs over the 30 percent affordability limit established by HUD and will, therefore, be "unaffordable" by definition.
2. To the extent that unaffordable bills are charged to Section 8 households, the

utility will likely incur credit and collection costs to collect the excess. To simply "forgive" this excess bill will avoid those credit and collection expenses for that excess over the utility allowance.

3. The direct vendoring of payments will eliminate all other credit and collection expenses for the bills actually covered by Section 8 utility allowances during the course of the year as well. The "affordable" portion of the bill --i.e., that portion covered by the utility allowance-- will *automatically* be paid each month to the utility while the remainder is written off.
4. The amount of the excess will provide one measure of the need for utility-financed energy conservation programs directed to these Section 8 households. To the extent that such conservation programs can be targeted to participating Section 8 households, the utility has the ability to eliminate the excess over time. The bills will be reduced while the allowance remains the same.

In February 1995, Houston Lighting and Power Company (HL&P) agreed to test the underlying cost assumptions behind a direct vendor program for Section 8 households through a "shadow billing program." Under the HL&P pilot project, the utility will collection information for a targeted group of between 1,500 and 3,000 customers. The Shadow Program will compare the payments of electric bills of participants to the amounts that would have been received by HL&P under a direct vendor section 8 utility allowance program. HL&P has agreed to operate the pilot program to gain three years of data.

Similarly, in 1993, Connecticut Light and Power Company (CL&P) agreed, in a stipulated settlement to its rate case, to implement a pilot project under which the company would accept direct vendor payments of Section 8 utility allowances as "full" payment of a Section 8 tenant's electric bill, irrespective of what portion of the bill is actually covered by the allowance. Under a "direct vendor payment," a local Public Housing Authority would pay a Section 8 tenant's utility allowance directly to the company.

As in Houston, the Connecticut pilot program was designed to test the hypothesis that entering into direct vendor payments will increase revenue to the company. Moreover, the program was proposed as a mechanism to test whether entering into direct vendor payments, with its automatic payment of utility allowances to the company, would reduce credit and collection expenses to the company in serving Section 8 tenants. In approving the pilot project in June 1993, the Connecticut Department of Public Utility Control (DPUC) explicitly held: "The [Commission] supports Section II.E of the Partial Settlement. CL&P, on consultation with the City of Hartford and other distressed municipalities, will design a

pilot program involving direct payments to the Company from local housing authorities."⁹⁶ Information on that pilot project is unavailable at this time.

TAX PROGRAMS

Expenditures by businesses in Colorado need not necessarily involve the direct expenditure of state funds. Instead, the state could establish tax incentive programs designed to promote the formation and funding of public/private partnerships.

Tax programs designed to provide incentives for Colorado corporations to take an active role in helping to address the issues of poverty are one important tactic to use in providing fuel assistance for the poor. Such a program in Colorado could be modelled on the Neighborhood Assistance Act Program in the State of Connecticut. A Colorado Neighborhood Assistance Act Program could include winter heating and crisis assistance, as well as the funding of energy efficiency improvements. This effort, in other words, would include sufficient funding to permit the inclusion of energy interventions for households at or below 150 percent of the federal Poverty Level, including the provision of energy efficiency improvements.

Chapter 228a of the Connecticut General Statutes⁹⁷ provides a tax credit for business firms which sponsor approved local programs. Programs must be proposed and conducted by private non-profit agencies, or municipalities, and be approved by the municipality in which the programs are to be carried out. Programs are to be directed toward "neighborhoods," defined to include "any specific geographic area, urban, interurban, suburban or rural, which is experiencing problems endangering its existence as a viable and stable neighborhood."⁹⁸ The state revenue Department must also approve the program.

The amount of the tax credit provided to the local program varies by the type of program offered and by the population being served. Programs for which tax credits may be received include neighborhood assistance,⁹⁹ job training, education, community services, crime prevention, energy conservation,¹⁰⁰ employment programs directed toward the handicapped,

96. The referenced Section II.E simply uses the same language: "CL&P, in consultation with the City of Hartford and other distressed municipalities, will design a pilot program involvin direct payments to utility vendors from local housing authorities."

97. CGSA, §§12-631 - 12-638 (1992).

98. CGSA, §12-631(f) (1992).

99. This include the furnishing of financial assistance, labor, material, or technical advice to aid in the physical improvement or rehabilitation of all or any part of a neighborhood.

100. This includes any program under which at least 75 percent of the persons occupying the properties toward which the conservation is directed have incomes not exceeding 150 percent of the Federal

employment programs directed toward unemployed persons who are fifty years old or older, employment programs directed toward AFDC recipients, community-based substance abuse prevention or treatment programs, and programs for the construction or rehabilitation of dwelling units for families of low or moderate incomes.

In seeking to have programs designated to be eligible to receive the Neighborhood assistance tax credit, the local governments must provide documentation to the State indicating for each program specified: the concept of the program, the neighborhood area to be served, why the program is needed, the estimated amount required to be invested in the program, the suggested plan for implementing the program, and the agency designated by the municipality to oversee the implementation.¹⁰¹

Under the Neighborhood Assistance Act Program, a tax credit of either 40 percent or 60 percent is assigned by the State when approved proposals are received by a municipality. As a general rule, programs targeted to populations at or below 150 percent of the Poverty Level for the preceding year are granted a credit of 60 percent.¹⁰² Municipally-approved programs which serve other populations receive a 40 percent tax credit. Limits are placed on the receipt of benefits under the program. No non-profit agency may receive more than \$150,000 in the aggregate in any one program year. Moreover, no business may receive more than \$75,000 in tax credits in any one program year.¹⁰³ Finally, no firm may receive a tax credit unless its total contributions either equal or exceed the previous year's contributions. The total cost of the program is capped at \$3.0 million per year. In addition, total 60% tax credits are capped at 60 percent of the program costs while total 40% tax credits are capped at 40 percent.

The existing Neighborhood Assistance Act Program requires local non-profit agencies to determine for which of their programs they will seek business contributions. The agencies must send an application for their programs to a local government, which must then hold a public hearing and approve all requested programs before submitting them to the State. The State, after reviewing and approving programs, then returns to the municipalities lists of the programs approved for sponsorship along with an identification of the amount of tax credit to be awarded per program.¹⁰⁴

(.continued)

Poverty level.

101. *Id.*, ¶12-632(a).

102. So, too, are programs where 75 percent of the participants are disabled, regardless of their income level.

103. Conversely, no contribution of less than \$250 will be accepted for consideration for a tax credit.

104. Tax credits are allowed to be carried forward and backward by the firm. Approved programs that may reasonably be expected to last for more than one year may be sponsored over a period of time, with appropriate tax credits reserved by the State for the life of the program. Any amount for which

A program based on Connecticut's Neighborhood Assistance Act program provides a significant opportunity for Colorado's businesses to participate in the provision of low-income energy assistance. Like in Connecticut, such a program would require legislative action. Nonetheless, emulation of the Connecticut legislation deserves consideration in Colorado.

ARIZONA'S NOT-QUITE SUCCEEDED RATEPAYER ASSISTANCE FUND

Fuel assistance initiatives in other states do not necessarily have to succeed in order to provide important lessons, and ideas, for use by others. Arizona's effort to capitalize a low-income energy assistance fund is one such program. In 1992, the Arizona legislature enacted a ratepayer assistance trust fund that would have raised from \$44 to \$55 million to supplement the state's LIHEAP program. Utilities, who actively supported the legislation, were asked to agree to place into the fund a voluntary .006 percent annual assessment for five years, after which each year's interest from the fund would have gone in perpetuity to supplement the state LIHEAP program.

The legislation required that utilities announce their intent to participate in the voluntary program by April 30, 1993, and nearly all of the state's utilities, including smaller unregulated ones, *intended* to do so. The companies saw the assessment as a reasonable way to address a serious problem while assuming they could simply recover the cost of the assessment through a corresponding rate increase that would not need regulatory approval.

The deal fell apart when the Arizona Corporation Commission announced that utilities would have to seek such an increase through rate hearings, just like utilities must seek for any other request for an increase in customer rates. Utilities were thus faced with having to announce their participation in the fund before knowing whether, or to what extent, regulators would pass along the increased costs through increased rates. As a result, utilities chose *not* to participate.

According to Arizona officials, the trust fund concept still appears to have been a reasonable mechanism to generate additional dollars for fuel assistance. The trust fund concept may have worked, it is believed, if there had not been a strict deadline as to utility company participation and if questions as to who should pay for the assessment --utility customers or shareholders-- were resolved either through legislation or through some expedited single-issue regulatory procedure.

PROMOTION OF THE EARNED INCOME TAX CREDIT

(.continued)

a credit is granted, however, must be expended by a business firm under an approved program proposal during the firm's income year.

One program that is not explicitly an "energy assistance" program, but which delivers extensive benefits to low-income households to use for paying home energy bills, involves the efforts of many utilities to promote participation in the federal Earned Income Tax Credit (EITC).

The Earned Income Tax Credit is a refundable federal tax credit for low-income people who work. For tax year 1994, working families with one child that had income less than \$23,755 could be eligible for a credit of up to \$2,038. Families with more than one child that had income less than \$25,296 could be eligible for a credit of up to \$2,528. Until now, only families with children could receive the earned income tax credit, but this year, for the first time, low-income workers without children can be eligible if they have income less than \$9,000. The maximum these workers can receive is \$306.¹⁰⁵

Low-income households do not even have to owe taxes in order to receive the EITC. Even workers who earn too little to owe federal income tax can be eligible for the EITC, but they *must* file a federal tax return. The average refund received by low-income families in 1994 (for the 1993 tax year) was \$1,000 per family.

Some utilities have become extremely aggressive in promoting the enrollment by low-income households in the EITC. One utility, Public Service Electric and Gas Company (PSE&G), in New Jersey, found that the additional resources represented by the EITC would help alleviate many bill payment (and inability-to-pay) problems by low-income customers. According to PSE&G research, more than nine of ten (9 of 10) households receiving EITC refunds use those refunds to pay household bills.

Given PSE&G's promotion of the EITC in New Jersey, New Jersey's number of EITC recipients increased by 4.9 percent. According to PSE&G, as of July 31, 1994, in 1994 alone, New Jersey low-income residents had received \$60,000,000 more in EITC benefits than they had received by August 29 of 1993. This is 35 percent higher than the national average for the same period.

PSE&G spearheaded the efforts in that state to encourage income-eligible households to apply for the EITC. PSE&G created and funded a "1-800" hotline to promote the EITC. Outreach activities used to publicize New Jersey's hotline were both creative and effective. Some of that utility's activities included:

- o Over 100,000 flyers were produced by PSE&G and distributed by community volunteers.

105. As of the time of this writing, it is not clear what the Republican Congress will do to the EITC. While the program will likely remain, however, there is a significant probability that both eligibility levels and benefits to those who remain eligible will be substantially curtailed.

- o 750 municipal buses carried posters "advertising" the PSE&G EITC number.
- o An EITC commercial sponsored by PSE&G was played just before New Jersey lottery drawings. It started with: "If you found a lottery ticket worth \$2,000, would you throw it away?"
- o PSE&G helped sponsor public service announcements by Governor Christie Whitman and Senator Bill Bradley to spread the message.
- o Collaborating with the New Jersey Division of Motor Vehicles, PSE&G produced inserts advertising the EITC through 350,000 vehicle registration renewal form mailings. It was headlined "Drive Yourself to a Treasure."

In addition, PSE&G reported that with the Company's assistance:

- o Over 3.5 million envelope stuffers, flyers, and posters were distributed to reach potential EITC recipients.
- o An additional 1.1 million flyers describing EITC were delivered to parents of the state's public school children.

This effort is an indirect, but substantial, source of "fuel assistance" for low-income households. According to one article published by an Edison Electric Institute (EEI) staffperson, of the low-income households receiving EITC credits, 25 percent used their credits to pay current utility bills while an additional 30 percent used their credits to pay past-due utility bills.

TITLE IV-A LEVERAGING FOR EMERGENCIES IN HOUSEHOLDS WITH CHILDREN

While as discussed above, Colorado has established a mechanism through which it seeks to leverage AFDC's Title IV-A funds, it might still be appropriate for the state to consider what other states have been doing in this area. Particular innovations have occurred in Pennsylvania and Wisconsin. Michigan's Positive Billing program, discussed elsewhere, also is an initiative funded through Title IV-A.

Pennsylvania has for several years used Title IV-A funds to provide special needs allowances for households receiving benefits under the Aid to Families with Dependent Children (AFDC) program. This separate AFDC-funded energy program is operated concurrently with the LIHEAP program, and frees LIHEAP program funds that would have ordinarily been granted to these Title IV-A eligible households for use by other households eligible for LIHEAP benefits. According to Pennsylvania LIHEAP officials, the Title IV-A program provides \$55 in Federal funds to match approximately \$45 in State funds for the special needs allowance.

In addition, through FY 1994, Pennsylvania provided state funds to match Title IV-A energy emergency grants. Under this program, AFDC-eligible households (with children) received an emergency crisis grant in lieu of the LIHEAP crisis grant, thus again freeing up LIHEAP funds to serve additional households. In FY 1995, however, the use of these energy emergency grants was discontinued because of the lower federal match. In addition, according to Pennsylvania LIHEAP officials, it ensures that those persons who need a subsequent Emergency Assistance grant for shelter will not be denied due to the federal Title IV-A regulations which mandate that Emergency Assistance payments may be authorized only during one 30-day period in any 12 consecutive months.

The amounts leveraged through Title IV-A in Pennsylvania were substantial. A computer-generated report for the state LIHEAP office showed \$10,084,125 provided in cash grants through Title IV-A for FY 1995. In FY 1995, the LIHEAP agency said, roughly 13 percent of the LIHEAP population was Title IV-A. The final figures for FY 1994 showed \$10,150,067 in Title IV-A funds provided for cash grants. In addition, \$1,670,752 was provided in crisis grants through the program subsequently discontinued. Oil overcharge funds are used for the state match in Pennsylvania. It is not clear what, if anything, will be done by the state when those matching funds are exhausted.

While Pennsylvania's use of LIHEAP and Title IV-A funds was "invisible" to the household, the source of funds for the household is not entirely without significance. Under the AFDC program, a household has the choice of whether to receive the benefit as a direct cash grant or whether to send it to the vendor. According to state LIHEAP officials, only two percent choose to keep the grant for themselves.

The Wisconsin approach to Title IV-A begins to address the issue of what to do when oil overcharge funds are not available. Wisconsin continues to develop a proposal under which utilities in Wisconsin --or at least the large investor-owned utilities-- will provide a grant to the Wisconsin Department of Health and Social Services for an expanded emergency furnace assistance program and crisis assistance program. These funds will be used for households where children are at risk because of an inoperable or unsafe furnace or because children are threatened with loss of heat due to the actual or pending disconnection of a utility service because of unpaid arrearages owed on a utility bill. The state will use the funds provided by utilities to:

- o expand emergency repair and replacement of furnaces; and
- o avoid disconnection of utility service because of non-payment of arrearages by establishing affordable payment plans and paying for arrearages for households which effectively participate in a payment plan.

The state's distribution of funds will be part of the AFDC Emergency Assistance Plan.

Under the proposed Wisconsin program, utilities will contribute funds to the state General Fund for use in the LIHEAP program. The funds provided by the utilities will be unrestricted and available to the state to determine their use. The state has made a decision to utilize these funds in the AFDC Crisis Assistance Program to better meet the needs of AFDC families as defined under the state's existing AFDC emergency assistance program. According to Wisconsin LIHEAP officials, in Wisconsin, AFDC Emergency funds have been used in conjunction with LIHEAP crisis funds for home heating emergencies under the AFDC plan for many years.

The Wisconsin program was developed after the Wisconsin Department of Economic Support approached the Wisconsin Utilities Association with a proposal for a public/private partnership to meet the crisis energy needs of families under Wisconsin's AFDC Emergency Assistance Plan. After prolonged discussions, the state reached an agreement under which the utilities will provide start-up funds for the project and continue to make funds available on a quarterly basis to reduce customer arrears. The state agreed to match utility funding dollar for dollar up to \$500 per household per year with AFDC - Emergency Fund money.

The provision of a utility grant to the state was to meet the concerns of the federal Administration for Children and Families (ACF) that federal Title IV-A matching funds be provided by the state. ACF had expressed concerns with an earlier proposal where the funds were provided directly by the utilities rather than the utility funds being contributed to the state and the state paying benefits and then reporting the payments for federal match.

It is anticipated that the Wisconsin program will see its first year of operation during the 1995 - 1996 Fiscal Year.

CHAPTER 9: DECIDING UPON FUNDING RECOMMENDATIONS

The purpose of this Chapter is not to make comprehensive recommendations for fuel assistance funding and program administration in Colorado. Many such recommendations, however, are implicit in the discussion above. The role of developing funding recommendations is to be largely left to Colorado's Task Force on Energy Assistance to be convened by the Governor.

What this Chapter *does* do is two-fold.

- o First, the Chapter presents a list of criteria that might guide and assist the Task Force in developing funding recommendations. Along with the list of criteria comes a description of the role of each component of the list. The criteria are listed in no particular order of priority. Nor are they necessarily consistent one with another. Not all criteria will be applicable to all programs. It will be up to the members of the Task Force to use and apply the criteria as they see fit.
- o Second, the Chapter presents an *illustrative* list of potential funding options for consideration. Other than the implicit endorsement of the merit in considering each option by their mere inclusion in the list --no potential option would be presented that did not at least merit consideration-- these potential funding options are presented without recommendation.

CRITERIA FOR DETERMINING FUNDING OPTIONS

No question exists but that there is a need for additional funding for low-income energy assistance in Colorado. According to the calculations above, if the state were to serve 100 percent of the need for 100 percent of the low-income population (defined to be those

households at or below 150 percent of the federal Poverty Level), the cost would exceed \$195 million a year. Obviously, no single source of funds can be relied upon to meet all or any substantial part of that need. Choices will have to be made. In making such choices, there are 16 criteria that should be considered.

1. **Repeatable:** A funding source should be repeatable each year. One time foundation grants, for example, as well as influxes of monies such as the "oil overcharge" funds should be not relied upon as a source of funding upon which to base a permanent fuel assistance structure.
2. **Stable (not a legislative appropriation):** In a similar vein, a funding source should generate a stable source of revenue. Legislative appropriations have historically not been such a stable source of funding. Year-in and year-out with LIHEAP, for example, Congressional appropriations have been uncertain, making both the design and administration of the federal fuel assistance effort difficult. Long-term problems should not depend upon short-term solutions to which there may or may not be a long-term commitment.
3. **Ubiquitous if not universal:** Fuel assistance should be wide spread. There is, indeed, a tension between this criteria and the next criteria (involving targeting to need), but they are not mutually exclusive. To be "ubiquitous," fuel assistance should be as likely to reach a rural low-income household heating with propane in El Paso County as an urban low-income household heating with natural gas in Denver.
4. **Targeted to need:** Fuel assistance should not simply be an alternative income transfer program. If fuel assistance is to serve its unique role, it should be targeted to households having an *energy* need. An "energy need" is defined for these purposes as having an energy bill that imposes a disproportionate burden as a percentage of income.¹⁰⁶
5. **Enough to matter:** If the state is to make a commitment to any particular source of fuel assistance dollars, that funding source should generate enough dollars to make a difference. As can be seen from the total energy needs of the state, the need is not to generate tens of thousands (or even hundreds of thousands) of dollars, but rather to generate millions of dollars. While some initiatives may (and will likely) have small individual components, the overall impact should "make a difference."

106. "Energy need" is more precisely defined in the "definitions" section below.

6. **Cheap enough to do:** The counterpart to the "enough to matter" criterion is that any fuel assistance program which is considered must be within the financial capability and political wherewithal of the state to accomplish. To decide that utilities should ante up \$100 million a year for fuel assistance, in other words, does not present a realistic political or financial proposition.
7. **Easy to access: initially and each year:** Fuel assistance that is not easily accessible to the low-income population does not serve any particularly useful function. Extensive and onerous application procedures, income verification, proof of "need," and the like interfere with solutions to the low-income energy problem.
8. **Multi-fuel capability (alone or in combination):** Not all components of the fuel assistance program must reach all primary heating fuels. But the portfolio of programs must have something for everyone. Given the extensive reliance upon propane as a primary heating source in many rural Colorado counties, to develop *only* a utility-based fuel assistance program would be inappropriate. At the same time, while the benefits of a fuel assistance program must flow both to utility ratepayers and users of bulk fuels, the burdens of supporting low-income energy assistance must be borne by all energy industries (including vendors of bulk fuels) as well.
9. **Promotes "good" behavior:** The concept of "the deserving poor" should be soundly rejected. Neither low-income children nor low-income adults should be placed in the "heating or eating" dilemma due to the political and social mores of the middle class majority. Nonetheless, fuel assistance programs can be designed to promote desirable behavior: taking care of arrears, making regular monthly payments, engaging in sound budgeting. New fuel assistance programs in Colorado should promote individual household responsibility and self-sufficiency.
10. **Administratively simple:** Administrative simplicity is an attribute that implicates both the success of the program and the expense of the program. It is often a temptation to seek to write program requirements that address every possible permutation of low-income behavior and to develop "appropriate" responses to each situation. Complexity, however, often devolves into unmanageability and to excessive expense. Simplicity is a goal toward which to strive. Moreover, simple programs are easier to explain. The research below shows that the primary barrier to fuel assistance participation is the lack of information and understanding.
11. **Independent of social welfare:** Another primary barrier to participation in existing fuel assistance programs is the historic tie that these programs have

had to the existing public benefits system. While that tie is necessary and good --the research above shows that participation in the public benefits network helps people to know about and participate in fuel assistance-- there must be *some* component which is independent of public assistance. Funding in the nature of workers compensation, unemployment, social security, or the like, will reach a discrete section of the population that does not want to take money from the government or to otherwise be associated with a public benefits program.

12. **Permanent:** A funding source for fuel assistance should be made a permanent structure of the Colorado landscape. Addressing energy assistance in some comprehensive way in 1996, in other words, should preclude the need to re-visit the issue in the near term. Another attribute of "permanent" is self-sustaining. A fuel assistance funding source that requires annual (or periodic) decisions for its continuity should be avoided.
13. **Home energy, not just home heating:** While images of persons freezing in a Colorado winter are perhaps what come to mind when thinking about the need for fuel assistance, home heating need not be the exclusive focus of a fuel assistance program in Colorado. Indeed, home heating represents just over half of the total home energy use of low-income Colorado residents and *less* than half of the home energy bill. Moreover, hot weather can be just as deadly as cold weather to low-income individuals. Finally, home heating systems often rely upon non-heating energy to operate, as electricity may, for example, be needed to run fans or pumps and the like. One option available for generating fuel assistance is to generate sufficient funds to address total home energy, not just home heating.
14. **All parties, public and private, recognize their part:** Given (a) the need for greater resources; (b) the adverse impacts on the community from unaffordable home energy burdens; and (c) the substantial benefits that flow to the energy industry as a result of fuel assistance, an expanded public/private partnership is an essential component of new Colorado fuel assistance programs. Each party to the bargain --this includes the low-income household, the government, the community-at-large, and the energy vendor-- should contribute in some fashion to resolving the inability-to-pay problem.
15. **Liquidating in the long-term:** While for all of the reasons outlined in the text above, this report does not address the funding and delivery of energy efficiency, the government and industry components of any fuel assistance program should be structured such that the cash supplement responsibilities are potentially liquidating to some degree through the implementation of energy efficiency measures.

16. **Supplement not supplant:** The design of a new fuel assistance program should be concerned with the opportunity costs of "new" investments in low-income fuel assistance. These opportunity costs represent circumstances where the investment supplants rather than supplements funds available for low-income energy needs. If the funding newly channeled to fuel assistance had not been spent on low-income energy needs, in other words, would it otherwise have been spent on low-income housing, or job creation, or education? To displace current program funds by funding currently devoted to other projects with beneficial impacts for low-income households may very well result in net losses to the constituent community.

EXAMPLES OF POTENTIAL FUNDING SOURCES

A variety of potential funding sources are evident from the discussion thus far. Taking primarily examples from other states, and projecting them on to Colorado, would result in the following:

Ratepayer Assistance Fund

Arizona's proposal was for electric and natural gas utilities to contribute .006 percent of their annual gross revenues for a five year period to create a Ratepayer Assistance Fund. The most recent five year period for which data is available for total electric and natural gas expenditures is the period 1988 through 1992. If such a fund had been capitalized during that period, the total contribution would have reached \$78.8 million. Assuming different levels of returns in ensuing years would yield a contribution toward fuel assistance of from \$6.3 to \$11.0 million per year.

{PRIVATE }Assumed Return	Total 5 Year Balance	Annual Fuel Assistance
8 percent	\$78,798,600	\$6,303,888
10 percent	\$78,798,600	\$7,879,860
12 percent	\$78,798,600	\$9,455,832
14 percent	\$78,798,600	\$11,031,804

EITC Promotion

One New Jersey utility, in conjunction with a variety of public and private agencies, undertook an extensive promotion to enroll eligible households in the federal Earned Income Tax Credit (EITC). The goal of the promotion was to increase enrollment by at least five percent. The program succeeded in generating an increase of 4.9 percent.

According to the most recent federal data available, 164,000 Colorado households participated in the EITC in 1992. Increasing this participation by five percent would add 8,210 households to the EITC rolls in Colorado. At an average benefit level of \$1,000 per households --this may change given Congress' intent to scale back the EITC program. This increased participation yields an additional \$8.2 million in low-income assistance to the state of Colorado. According to published studies, more than fifty percent of the households who receive the EITC use all or part of it to pay either current or past due utility bills.¹⁰⁷

Margin Over Rack Program for Propane

Two states, Massachusetts and Connecticut, have implemented "margin over rack" pricing for their LIHEAP recipients who heat with fuel oil. According to the LIHEAP officials in those states, the margin over rack program saved LIHEAP recipients between eight and ten percent of their winter fuel oil heating costs. The lost margin, the LIHEAP officials in those states reported, was insignificant since LIHEAP recipients represented only 2.5 to 3.0 percent of the total state fuel oil usage.

In Colorado, while a margin over rack program for fuel oil would not be desirable, a margin over rack program for propane would deliver significant benefits to LIHEAP recipients. In the 1994 - 1995 program year, LIHEAP provided 2,331 households with an average benefit of \$552.08 (\$1,286,898 in total benefits). An average nine percent (9%) savings would generate more than \$116,000 in additional benefits, or an average of \$49.70 per propane

107. The *amount* of the tax credit used to pay utility bills, however, was not determined.

recipient. As with fuel oil in Connecticut and Massachusetts, LIHEAP propane revenue represents less than three percent of statewide residential propane revenue.¹⁰⁸

Two other programs directed toward propane users would generate similar savings. According to South Dakota LIHEAP officials, a "summer fill" program saved propane customers roughly 9.5 percent off their bill. This would generate additional savings per recipient of more than \$52. In addition, providing the cash price rather than the credit price to propane users saved from 8 to 12 percent in the states where such a discount had been negotiated. Such a discount would generate additional benefits of from \$44.20 to \$66.25 per recipient for LIHEAP's propane users.

Contributions in Lieu of Taxes

As funding becomes tighter for important social programs such as fuel assistance, it is necessary to take a closer look at the wide range of educational and charitable institutions that are exempt from local property taxation. Statewide in Colorado, for example, in 1994, private schools owned 606 parcels of land which, along with real property improvements, were worth in excess of \$118 million yet exempt from local taxation. In addition, in 1994, charitable institutions owned 2,629 parcels of land which, along with real property improvements, were worth roughly \$319.8 million, yet were exempt from local property taxation.

Substantial debate swirls today over the advisability of removing, or at least curtailing, the tax exemptions for historically tax-exempt institutions. In many local jurisdictions, the taxing authority seeks to avoid this debate by imposing "service fees" on services that have previously been provided without charge. There is no need for efforts to develop new sources of funding for fuel assistance to insert themselves into this debate.

What Colorado *should* do, however, is to seek a commitment on the part of tax exempt institutions to make voluntary contributions toward the energy assistance program. The contributions can be collected through the existing utility billing process and turned over to the fuel assistance distribution network. Contributions could go to support a statewide effort or be limited to distribution to local households identified by the local fuel assistance agency. Colorado exempts both schools (other than schools operated for private or corporate profit) and charitable organizations (in the conduct of their charitable functions) from sales taxes.

Contributions to support fuel assistance bear no relationship to the value of tax exempt

108. Concededly, this conclusion mixes years. The last year for which residential propane revenue is available is calendar year 1992 (\$47.0 million). Dividing that by 1994-1995 LIHEAP propane benefits of \$1.3 million yields a LIHEAP proportion of 2.7 percent. Presumably, as with other fuels, statewide propane revenue has increased, not decreased, from 1992 through 1994 and thus the 2.7 percent figure is thus an outer limit for the proportion which the LIHEAP population represents.

property owned by these institutions. What Colorado should consider, therefore, is a campaign where tax exempt institutions would pay the equivalent of what they would have paid in sales tax on their utility bills in the event that the institution did not have a tax exempt status.

According to the American Law Institute/American Bar Association (ALI/ABA), the cities of Boston, Miami, New Haven and Newport (Rhode Island) are implementing voluntary user fee programs for not-for-profit organizations in lieu of property tax payments. In addition, Lehigh and Allegheny Counties (Pennsylvania), as well as Pittsburgh, have voluntary user fees in lieu of property tax payments.

Such a contribution in lieu of taxes could be structured similar to the new Illinois Telephone Assistance Program, which was created by state law and is based on voluntary contributions to fund assistance to low-income families who need basic local phone service. UTAC is the non-profit organization comprised of phone company and consumer, and low-income representatives and created under direction of the Illinois State Commerce Commission to administer the new telephone assistance program.¹⁰⁹

Funding for UTAP comes strictly from voluntary donations. Beginning February 1, 1993, inserts were included in phone bills soliciting contributions. Residential customers were asked to select \$0.50, \$1.00, \$2.00 or \$5.00 to be added to their bill each month. Business customers were asked to select \$1.00, \$5.00, \$10.00 or \$25.00. The selected amount is then added to the customer's bill each month until the customer requests to be removed from the program.

After the first nine months of the program (September 1993), and every six months thereafter, UTAC files a petition with the Illinois Commerce Commission asking the Commission to determine the type and amount of assistance, if any, that can be provided to eligible consumers. Depending on the amount of the fund, the Commission, after hearings, will order that the fund be used to provide additional assistance on installation, assistance on the customer's monthly bill, or both.

Rather than creating simply another fuel fund "checkoff" in Colorado, the proposal here is to target an effort modelled after UTAC toward tax exempt institutions. There would, however, be no need to create a new and independent non-profit corporation like UTAC. Contributions generated through such a program could be administered by CEAF. Moreover, rather than asking such institutions to commit to specific denominations of contributions, the proposal is specifically to model the program on a "contribution in lieu of taxes" model: the foregone sales tax.

109. Given the state LIHEAP agency, as well as CEAF, there would be no need for a new non-profit to administer such a fund.

The proliferation of checkoffs suggests that checkoffs are a highly successful method of fundraising in a time when other fundraising methods seem to have run dry. The federal and state governments have utilized the tax checkoff to allow taxpayers to designate part of their tax liability for one of the two major political parties or to make voluntary contributions to designated funds listed on the state's tax form. Local governments have used tax checkoffs to fund local scholarship funds. Local natural gas and electric utilities use checkoffs to fund "fuel funds," crisis funds to provide assistance to low-income households facing the loss of home heating due to an inability-to-pay. In addition, Working Assets, a "socially responsible" privately owned corporation offering credit card services and money funds, recently invested several million dollars to become a long distance telephone company so that the company could generate donations through a checkoff on telephone bills.

A "contributions in lieu of taxes" program for not-for-profit tax exempt institutions, under which such institutions contribute to an energy fund an amount equal to what they would have paid in sales taxes on their utility bills deserves consideration in Colorado. No estimate of the funds possible through such a mechanism has been developed.

Creating a State Earned Income Tax Credit for Working Poor

Colorado may wish to create a tax credit directed at providing assistance to that class of households who earn too much to receive public assistance but not enough to consistently pay all necessary household bills: the working poor. The working poor involve a group of customers about whom service providers often express concern because of their ability to "fall through the cracks" of available assistance.

At least four states have state equivalents to the federal Earned Income Tax Credit (EITC). These states include Vermont, Wisconsin, Minnesota and New York. Under these programs, the state credit is in addition to the federal credit. As a result, the amounts reported above (for the federal program only) will be lower than the combined federal/state credits that are in fact available.

These state programs are generally tied to the federal program. In Wisconsin, for example, the state Earned Income Tax Credit is a percentage of the federal credit. Households with one child receive four percent of the credit; households with two children receive 16 percent of the federal credit; and households with three or more children receive 50 percent of the federal credit. In tax returns filed in 1995 (for the 1994 tax year), roughly 164,000 households received an average state earned income tax credit of \$278. In contrast, Minnesota provides a "working family" credit equal to 15 percent of the federal credit. According to the Minnesota revenue agency, no special forms are necessary. Households who qualify for the federal credit receive the state credit. Similarly, New York provides 10 percent of the federal credit for Tax Year 1995. In Tax Year 1996, the New York credit increases to 20 percent. New York's credit is "refundable" for state residents; if the credit

reduces a qualifying household's tax liability to \$0, they are entitled to a refund of the remainder of the credit.¹¹⁰

In Colorado, 235,685 households received the federal Earned Income Tax Credit for tax year 1994 (returns *filed* in calendar year 1995). These households received \$239.232 million in federal tax credits (or roughly \$1,015 per household). A state Earned Income Tax Credit set at 20 percent of the federal credit would generate an additional \$48 million in benefits for these households.

Expanding the Colorado Property Tax Credit Program

One way to expand the dollars available for low-income energy assistance in Colorado is simply to preserve the purchasing power, and income eligibility limits, for the PTC program at their original constant dollar level.

PTC Benefit Levels

The PTC was created in 1987, and provided for a \$160 energy credit in 1987 dollars. In 1987, however, that \$160 in tax credit would have purchased substantially more energy than the same \$160 would have purchased by 1994. Indeed, by 1994, the purchasing power of the tax credit would have fallen to only \$123. The impact on the amount of energy which such a benefit would purchase of the three major heating sources in Colorado is set forth below.

As can be seen, due to decreased purchasing power and increased prices in energy, the PTC home heating credit has lost much of its effectiveness in the roughly ten years since its enactment. If the PTC credit for home heating costs were indexed to the increase in the cost of living in Colorado, by 1995, the \$160 heating credit would have been \$208.

It is possible to calculate the incremental cost of increasing only this portion of the PTC credit (while leaving the property tax and rental credits constant). In the most recent year for which data is available, recipients of the PTC credit received \$352 of the potential maximum \$660 credit (53.3 percent). Applying this same ratio to a new maximum benefit of \$708 (\$500 property tax credit plus \$208 heating credit) and then multiplying times the most recent participation figure (31,864 households) yields a total credit that would have been granted of \$12,031,846. This compares to the total granted of \$11,257,773. As can be seen, therefore, indexing the PTC heating credit to inflation over the eight years since its inception (1987 through 1994) would have increased the heating benefits by roughly \$800,000.

110. For non-residents, the credit is non-refundable. If the credit reduces the tax liability to \$0, there is no additional cash refunded.

Eligibility Criteria

It is more difficult to create an index for the income side of the PTC equation. Increases in the cost of living need not bear any particular relationship to increases in income for Colorado's low-income population. Nonetheless, it is clear that the eligibility income of \$5000 for an individual and \$8700 for a married household is worth much less in 1995 than it was in 1987. In an effort to maintain a constant eligibility ceiling for the PTC program, rather than indexing the eligibility levels to the cost of living, it would be more reasonable to index these ceilings to increases in the federal Poverty Level. The federal Poverty Level is adjusted on an annual basis. Moreover, it at least purports to create some objective measure of what income means a household is "poor" in the United States. If Colorado had indexed its PTC eligibility ceiling income levels to the federal Poverty Level in 1987, the eligibility ceilings would have been \$6,750 for a single individual and \$11,750 for married households by 1994.

It is necessary to emphasize that to undertake both tasks --(1) to increase the eligibility level, and (2) to increase the benefit level-- is *not* to double count the need. Rather, on the one hand, to increase the eligibility without increasing benefits would mean that inadequate benefits are being provided to roughly the 1987 equivalent population. On the other hand, to increase the benefit levels without increasing the eligibility would mean that roughly equivalent benefits are being provided to a decreasing population base. Both actions are necessary simply to keep the PTC at the same point it was at when originally adopted.

Direct Billing Program

Most utility fuel funds today seek to generate dollars from their customers through the solicitation of voluntary contributions. According to a study by the Colorado

{PRIVATE }Home Heating Purchasing Power of PTC Tax Credit 1987 vs. 1994 dollars				
Fuel	1987		1994	
	Purchasing Power	Energy Purchased	Purchasing Power	Energy Purchased
Electricity (kWh)	\$160	2,343	\$123	1,695
Natural Gas (ccf)	\$160	338	\$123	274
Propane (gal)	\$160	338	\$123	174
NOTES: Electricity: 293 kWh per mmBtu. Natural gas: 10 ccf per mmBtu. Propane: 10.95 gallons per mmBtu.				

Energy Assistance Foundation (CEAF),¹¹¹ the primary methods of fundraising include solicitations through bill inserts and a checkoff system on the bill. According to CEAF, "bill inserts acquaint utility customers with the purpose of the fuel fund and explain() how it operates."¹¹² Reasons why bill inserts are "very attractive," CEAF found, include: (1) their low administrative cost; and (2) the fact that inserts "are well suited to deliver [the charitable donation] message succinctly and at a time when customers have their checkbooks out."¹¹³

One alternative proposal that merits consideration is for utilities to ask their customers not to donate their money, but to donate "desired behavior" which might generate both convenience for the customers and cost savings for the utility. Some of these cost savings should then be passed along as donations to low-income fuel assistance. One type of "desired behavior" comes readily to mind: the enrollment of customers in "direct payment arrangements." Such a payment scheme would be modelled on insurance and related industries who directly draw payment of bills from a customer's checking account at the time the bill is rendered.

Participation in a direct billing payment arrangement should generate cognizable savings to the affected utility company. Such arrangements should:¹¹⁴

- o Reduce working capital, by decreasing revenue lag days in the event that direct billing payments are made before the bill due date;
- o Increase the collectability of accounts receivable, as customers are moved into a more automatic system of bill payment;
- o Decrease credit and collection costs, as customers who may pay late or not at all (for reasons other than inability-to-pay) are moved into a more automatic system of bill payment; and
- o Decrease customer service expenses related to billing, payment processing, and perhaps even meter reading.

111. CEAF, *Colorado Fuel Fund Survey* (1993).

112. *Id.*, at 6.

113. *Id.*

114. *See generally*, Barbara Maesfield, "Why Electronic Funds Transfer Means Better Profitability for Insurance Companies," *Interpreter*, at 7 (April 1987) (describes how insurance companies use EFT as a payment mechanism. This has allowed companies to increase investment income and reduce expenses).

Experience with other utilities has found that roughly two to three percent of a company's residential customer base will agree to enroll in a direct billing payment arrangement simply for the sake of convenience. Assuming a \$3 per month per enrolled customer contribution to fuel assistance based on a share of the identified cost savings, a direct billing payment arrangement plan in Colorado which captures three percent of the residential market would generate roughly \$1.8 million in fuel assistance each year.

{PRIVATE } Customers	Number of Customers	Direct Billing Share	Direct Bill Customers	Monthly Savings	Added Fuel Assistance
Electric	950,000	0.03	28,500	\$3	\$1,026,000
Natural Gas	650,000	0.03	19,500	\$3	\$702,000
Total fuel assistance					\$1,728,000

Title IV-A Utility Matching Grant

Wisconsin's utilities have agreed to cooperate in a program to take advantage of the matching grant provisions of the federal emergency benefits for AFDC households. For the reasons articulated by the Pennsylvania LIHEAP office, however, such a program can perhaps be more fruitfully limited to the "special needs" allowance under AFDC.¹¹⁵ In addition, besides attracting federal matching dollars, earlier intervention in energy costs through Special Needs might prevent some of the perilous energy situations that lead people to apply for Emergency Assistance.

In short, "special needs," which may be recurring or nonrecurring, are usually defined as those needs that are recognized by the State as essential for some persons but not for all, and therefore, must be determined on an individual basis. They are part of the total "need standard" used to measure AFDC eligibility and determine benefit amounts for those families for whom such special needs items are appropriate. If a state includes "special needs" items in its standard, it must describe them and the circumstances under which they will be taken into account.¹¹⁶

Colorado utilities could follow the lead of the Wisconsin companies in providing the capital to generate the up-front state dollars needed to gain the federal matching funds. According

115. As discussed with regard to the Pennsylvania LIHEAP leveraging efforts, there are two *different* programs under AFDC: (1) the emergency grants provision (with a federal match of 50 percent); and (2) the special needs program (with a federal match of 55 percent).

116. As of October 1, 1990, the most frequently cited special needs items included additional or excess shelter, fuel or utilities; pregnancy allowances; and child care costs (not employment related).

to the Colorado LIHEAP office, roughly 16,500 AFDC households were provided fuel assistance during the FY 1995 program year. If Colorado utilities were to provide the same matching funds as Wisconsin companies did (\$250 per household), the federal match flowing back to the state would reach \$305. Through such a program, the incremental federal dollars flowing into Colorado would reach \$5.032 million. Counting the utility match, the total incremental dollars for Colorado fuel assistance would be roughly \$9.2 million.

Additional Federal and Total Fuel Assistance Dollars from Utility Matching Program AFDC Special Needs Program				
AFDC LIHEAP HHs	Utility Contribution (45%)	Federal Match (55%)	Incremental Federal Dollars	Total Added Fuel Assistance
16,500	\$250	\$305	\$5,032,500	\$9,157,500

Having cited "utilities" as the source of the matching payment, it should be noted that there is no reason why the entire burden of generating the state matching grant should fall on natural gas and electric companies. It would be entirely appropriate for the state to seek similar contributions from vendors of bulk fuels such as propane.

"Adopt a Crisis" Program

In addition to looking for some type of broad-based revenue raising measure to support fuel assistance in Colorado, the state should pursue at least one component that relies upon "voluntary giving." The trick in designing such a measure is how to devise such a voluntary campaign while trying to make it repeatable, large enough to be meaningful, and simple enough that program administrators do not have to spend tens of thousands of dollars each year to solicit individual \$10 contributions.

From the discussion of private funding sources above, it seems clear that Colorado is home to many places that give out "a little" money, a few hundred dollars that help just a few families. Moreover, from the survey of private funding sources, it became clear that there are places who really *do* believe in having the local community "take care of its own." Based on this insight, the state should perhaps attempt to build a decentralized distribution network for fuel assistance in addition to funding and maintaining the primary LIHEAP program.

Colorado should thus consider the merits of developing an "adopt a family" program for institutions large to small. Through such a program, each participant could commit to adopting a "family in crisis" to provide at least one crisis payment. Obviously, the larger the institution, the more numbers of families that could (and should) be "adopted." The adoption would agree to fund a crisis payment for a household determined to be in need by one of the local energy assistance providers. Some of the large businesses could adopt a reasonably

significant number of families in crisis.¹¹⁷

An "adopt a family in crisis" program should provide the opportunity for businesses large and small to participate. Given the number and amount of crisis payments revealed by the survey of private assistance, even small businesses should be able to contribute \$50 to \$100 for use in their own local community.

One Church--One Family

The "adopt a family in crisis" approach to developing local solutions to energy crises facing low-income households is consistent with the "one church--one family" initiative proposed by the National Urban and Rural Ministry Project of World Vision. According to that organization, "because this approach puts so many volunteers from the congregation in a direct relationship with the adopted family, it provides a welcome opportunity for service to the poor. At the same time, it is more than relief work; it is community development, because its goal is the self-sufficiency of the adopted family."¹¹⁸ According to World Vision, the "one church--one family" process works as follows:

The church commits to a long-term relationship, usually of one year, with a recently displaced family. The church pays three months' rent to resettle the family into housing: the first, the last and one middle month. Church volunteers break into task forces to work with and assist the family in a specific area of the family's life. The volunteers, trained to avoid dependency relationships with the family, encourage progression to self-sufficiency.¹¹⁹

One task force, the organization recommends, might work to find housing; another work to create a budget and help meet financial needs, and another to help find the funds needed to meet that budget. An employment task force might help locate employment for family members.

Pursuit of a "one church--one family" program could generate significant impacts for Colorado's low-income population. While data is not available on the number of religious congregations that exist in Colorado, information from the Colorado Department of Local Affairs, Division of Property Taxation, indicates that in 1994, there were 4,997 parcels of land exempt from property taxation as owned for purposes of religious worship. In 1993, there were 5,884 such parcels.

117. No effort is made at this point to define the term "reasonably significant number."

118. World Vision, *Rebuilding Our Communities: How Churches Can Provide Support, and Finance Quality Housing for Low-Income Families*, at 13 - 14 (1992) (Monrovia, California).

119. *Id.*

Assuming a rough correlation between the number of congregations and the number of church parcels, if a "one church--one family" program could reach from 4,000 to 5,000 low-income households annually, the program would make a tremendous difference.

The issue, of course, is how to develop and administer such a program. The leveraging effort to which Colorado should commit is to fund a fulltime staffperson (or two) to administer such an undertaking. This should not be public funding. And, while the initial inclination might be to "ask the utilities" to fund such a position, that inclination should be resisted as well. It would not be unreasonable for a large Colorado corporation (or a consortium of such entities) to commit to funding this position over a multi-year period. The position could be located at the Colorado Energy Assistance Foundation, or at some similar non-profit community service organization (such as Metro CareRing) so long as that organization was able to provide statewide services.

Energy Efficiency Funding

While the purpose of this research is not to develop new sources of funding for low-income energy efficiency initiatives, given the importance of delivering continuing dollars of fuel assistance (through reduced bills), and the recommended criteria that fuel assistance be self-liquidating (at least in some part), it seems unreasonable to completely ignore potential energy efficiency funding possibilities. Two such possibilities exist:

Fees on Property Transfers

The state of Nevada has capitalized a housing trust fund through the imposition of a fee on real property transfers. Under the Nevada scheme, a fee of 10 cents per \$500 of assessed valuation goes into the state Housing Trust. A similar fee could be imposed in support of low-income energy efficiency in Colorado. Rather than placing such a fee on all property transfers, however, a higher fee might be placed on fewer transactions: new residential building construction (and building alterations). If such a fee had been in place during the most recent five year period for which data is available, it would have generated a Trust Fund of more than \$8.0 million for low-income energy efficiency.

As can be seen, the fee proposed above does not impose a significant burden on persons engaging in new construction of residential buildings. Given the average valuation of new construction of residential buildings in the five year period, the fee would have ranged from \$76 on an average valuation of \$76,000 in 1989 to \$104 on an average valuation of \$104,000 in 1992 (or roughly one-tenth of one percent).

{PRIVATE }Colorado Low-Income Energy Efficiency Trust Fund Generated by Fee on Residential Building Permits								
	Valuation in (\$000)			\$500 Increments			Transaction Fee	Annual Fee
Year	New Construction	Additions & Alterations	Garages & Carports	New Construction	Additions & Alterations	Garages & Carports		
1988	\$980,290	\$195,088	\$30,531	\$1,960,580	\$390,176	\$61,062	\$0.50	\$1,205,909
1989	\$1,057,200	\$153,893	\$25,627	\$2,114,400	\$307,786	\$51,254	\$0.50	\$1,236,720
1990	\$1,156,507	\$149,331	\$23,755	\$2,313,014	\$298,662	\$47,510	\$0.50	\$1,329,593
1991	\$1,511,966	\$137,592	\$23,850	\$3,023,932	\$275,184	\$47,700	\$0.50	\$1,673,408
1992	\$2,439,179	\$126,573	\$25,567	\$4,878,358	\$253,146	\$51,134	\$0.50	\$2,591,319
Total:								\$8,036,949

{PRIVATE }Average Fee for New Construction Given Fee of \$.50/\$500 Valuation					
Year	New Construction Valuation (\$000)	Transaction Fee	No. New Construction	Avg New Construction	Avg Fee Per Permit for New Construction
1988	\$980,290	\$0.50	12,864	76,204	\$76
1989	\$1,057,200	\$0.50	11,131	94,978	\$95
1990	\$1,156,507	\$0.50	11,897	97,210	\$97
1991	\$1,511,966	\$0.50	14,071	107,453	\$107
1992	\$2,439,179	\$0.50	23,484	103,866	\$104

Assuming that these funds generate benefits at the same rate as the existing joint WAP/PSCO "Power Partnership Program," a benefit/cost ratio of 1.30:1 would imply net present value benefits (in terms of reduced life-cycle bills to low-income consumers) of roughly \$10.5 million from the five year investment.

Colorado could instead follow Nevada more directly and impose a fee based on the value of property transferred. It is possible to obtain some notion of the funds generated by such a mechanism by looking at the existing transfer fee of \$0.10/\$1000 of property value. Since no state agency centrally tracks the collection of such fees in Colorado, data from nine major counties in Colorado was obtained to determine the order of magnitude of what such a fee would generate for a weatherization trust fund. Such data for is presented below for 1993 and 1994:

[PRIVATE]Nine County Sample Value of Properties Transferred: Colorado				
County	1993		1994	
	Documentary Fee Revenue	Property Value	Documentary Fee Revenue	Property Value
Boulder	\$163,520.87	\$1,635,208,700	\$177,591.28	\$1,775,912,800
El Paso	\$198,799.10	\$1,987,991,000	\$214,463.96	\$2,144,639,600
Denver	\$185,658.00	\$1,856,580,000	\$223,455.00	\$2,234,550,000
Larimer	\$102,639.78	\$1,026,397,800	\$119,389.85	\$1,193,898,500
Pueblo			\$24,862.08	\$248,620,800
Adams			\$114,369.19	\$1,143,691,900
Arapahoe	\$233,440.23	\$2,334,402,300	\$255,280.31	\$2,552,803,100
Jefferson	\$245,545.62	\$2,455,456,200	\$259,574.75	\$2,595,747,500
Douglas	\$111,522.00	\$1,115,220,000	\$149,882.00	\$1,498,820,000

As can be seen, a fee like that used for the Housing Trust Fund in Nevada, when applied in the nine largest counties in Colorado, would have generated roughly \$1.5 million a year.

Fees on Energy Consumption

Low-income energy efficiency initiatives can be funded through a fee on energy consumption as well. Such a fee could be based on the model of the Vermont Home Weatherization Trust Fund.¹²⁰ In a statute effective July 1990, the state General Assembly created the Home Weatherization Trust Fund, administered by the director of the state WAP agency, the Vermont Office of Economic Opportunity. Pursuant to the statute, funds generated for the Trust Fund are to be commingled with WAP appropriations and are to be expended " * * *in accordance with federal law and this chapter."¹²¹

The Vermont Trust Fund is financed, at least in part, by a gross receipts tax of 0.5 percent on the retail sale of certain types of fuel by sellers receiving more than \$10,000 annual for the sale of such fuels.¹²² The fuels include heating oil and kerosene not used to propel a motor vehicle, propane, natural gas, electricity and coal.

To account for ongoing low-income conservation programs offered by public utilities in Vermont, the Vermont statute provides natural gas and electric utility companies providing demand side management programs that meet the goals of the weatherization program in an alternative manner approved by the public service board¹²³ may be eligible for credits against the tax.¹²⁴ The utility must file with the Board a request for such credits. The Board is directed to "authorize" the credits:

provided that such expenditures were prudently incurred and cost-effective as part of the utility's energy efficiency plan, that they provided basic weatherization services following a comprehensive energy audit and workplan, and that they were targeted to households at or below 150 percent of the federally-established poverty guidelines.¹²⁵

120. Vermont Statute Annotated, ¶2501.

121. VSA, ¶2501(a).

122. VSA, ¶2503(a).

123. In Vermont, the state public utilities commission is called the Public Service Board. This is to be distinguished, too, from the Public Service Department, which serves in the capacity of a state consumer advocate.

124. VSA, ¶203(d). In the 1992 reauthorization, the available credits were limited to 12.5 percent of the total funds collected through the assessment. If claimed credits exceed this 12.5 percent limit, they are to be granted on a *pro rated* basis.

125. *Id.*

Moreover, utility expenditures for "enhanced weatherization services," such as appliance and lighting upgrades and water heating repairs, upgrades and replacements, are to be eligible for the utility credits "upon a showing that they were prudently incurred and cost-effective as part of the utility's approved least cost plan *and* installed *in addition to* the provision of basic weatherization services to an eligible housing unit." (emphasis added).¹²⁶

In general, the funds generated by the gross receipts assessments in Vermont are to be used to supplement federal WAP dollars.¹²⁷ In addition, however, the statute authorizes a state program providing an "enhanced weatherization amount" up to \$3,000 if those amounts are cost-effective under rules promulgated by the state OEO. The statute finally permits the state to provide "amounts for low-income customers utilizing any high operating cost fuel, to convert to another fuel source under rules adopted by the [state OEO] director based on the cost-effectiveness of the converted facility over the life cycle of the equipment."¹²⁸

The Vermont Trust Fund generated roughly \$3.2 million in its first full year of operation, making it the primary source of funding for the state's weatherization program. The assessment began generating revenue in October, 1990, so calendar year 1991 was that first full year. Vermont's federal WAP allocation for FY 1992 was roughly \$1.2 million. Combined with federal WAP dollars, Vermont now weatherizes roughly 1,300 homes a year, double its prior production. (Moreover, since under the Trust Fund statute, homes may be weatherized up to \$3,000 per dwelling, the Trust Fund has permitted doubling the production *and* doubling the investment per home at the same time.)

According to a report to the state General Assembly in January 1992,¹²⁹ the state OEO said that the purposes of the gross receipts tax were "to provide a stable funding source for weatherization and to enhance the ability of the program beyond the restrictions of the existing federal DOE program."¹³⁰ In reporting on the progress of the Trust Fund to date (January 1992), the state OEO said:

126. *Id.*

127. VSA, ¶2502. "Under such rules, regulations, funding and funding requirements as may be imposed by federal law."

128. *Id.*

129. The original legislation directed that such a report be prepared and submitted.

130. Vermont State Office of Economic Opportunity, *The Vermont Weatherization Assistance Program: Report to the General Assembly* (January 1992).

Approximately 1200 Vermont homes will be weatherized in the current program year, using both DOE and Trust Fund dollars. By the end of this program year, almost 1300 homes will have been weatherized by Trust Fund dollars alone since the program's inception.

The Trust Fund portion of the weatherization program has truly been an enhancement. As provided in the statute, the Trust Fund allows considerably more to be spent on conservation in each housing unit than had been possible under the federal program alone. The Trust Fund has also allowed significant work to be done in replacing inefficient and/or unsafe heating systems, an activity not permitted using DOE funds.¹³¹

In reauthorizing the Trust Fund in 1992, the Vermont legislature relied on the observations by the OEO that if the Trust were *not* reauthorized, "there will be a 66% reduction in weatherization funds available to provide services to low income Vermonters" and "there will be 50% fewer homes weatherized with those remaining homes receiving a lower level of services."

Accordingly, the State of Colorado may wish to similarly consider the creation of a Weatherization Trust Fund. This fund should incorporate aspects of the Vermont endeavor. A Colorado program might include the following components:

1. It should be funded by an assessment of 0.5 percent of gross revenue.
2. The dollars generated by this assessment should be administered by the state weatherization agency;
3. The State should permit enhanced weatherization up to \$3,000, including heating (and/or domestic hot water) conversions for high operating cost fuels if cost-effective based on life cycle costs and benefits; and furnace replacements and retrofits;

131. *Id.*, at 3.

4. Public utilities providing natural gas and/or electric service should be exempted from this assessment providing that the expenditures by such were prudently incurred and cost-effective as part of the utility's energy efficiency plan as approved by the state PSC, that they provided basic weatherization services following a comprehensive energy audit and workplan, and that they were targeted to households at or below 150 percent of the federally-established poverty guidelines. Moreover, to be exempt, the alternative utility programs must meet the goals of the weatherization program in an alternative manner approved by the PSC and the state weatherization program.¹³²

{PRIVATE }Revenue Generated by 0.5% Tax on Energy Sales in Colorado (1992)			
Customer Class	1992 Sales	Trust Tax	1992 Revenue
Residential	\$1,217,400,000	0.005	\$6,087,000
Commercial	\$1,170,000,000	0.005	\$5,850,000
Industrial	\$695,200,000	0.005	\$3,476,000
Total	3,082,600,000		\$15,413,000

As can be seen, in 1992, the last year for which data is available, the total energy sales in Colorado reached roughly \$3.1 billion. An assessment of 0.5 percent applied against these revenues would have generated \$15.4 million for low-income weatherization in the state. If limited to residential sales alone, the 0.5 percent fee would have generated \$6.1 million in funds for a Weatherization Trust Fund.¹³³

Assuming that these funds generate benefits at the same rate as the existing joint WAP/PSCO "Power Partnership Program," a benefit/cost ratio of 1.30:1 would imply reduced bills to low-income consumers of roughly \$20.0 million a year.

132. While the extensive efforts by Colorado's utilities in the area of low-income DSM should be recognized, the warning of the Vermont OEO must be heeded, as well: "Utilities are mandated to invest in certain conservation measures which are deemed to be in the best interest of the utility and the ratepayers as a whole. A utility's interest is to reduce consumption of the power it sells (*i.e.*, electricity in most cases), whereas the weatherization program's goal is to save the individual low income household money or improve their (*sic*) living standard by increasing energy efficiency, regardless of energy source (*i.e.*, oil, propane, gas, electricity, wood, etc.). The credit provision presently in the law has the potential for reducing funds available for weatherization without providing comparable services to the recipient." *OEO Weatherization Report*, at 6.

133. The Vermont fund was not limited by customer class. Instead, the fee applied to all "retail sales."

CHAPTER 10: NONPARTICIPATION IN FUEL ASSISTANCE IN COLORADO

It matters not whether fuel assistance programs are adequately funded if the households who need those benefits to make energy burdens affordable either cannot or do not participate. One of the ongoing issues facing state policymakers, therefore, involves not how to distribute benefits to households who receive LIHEAP, but rather how to distribute funds to those who do *not* receive it. In general, if a substantial portion of the population knows about and understands the availability and advantages of obtaining benefits through LIHEAP, but chooses not to participate in any event, there is nothing for the Colorado LIHEAP program to be concerned about.¹³⁴ If, however, non-participants either do not know about LIHEAP, or face some obstacle which *prevents* participation, Colorado LIHEAP should be taking actions to address and overcome those failures.¹³⁵

The data on nonparticipation in Colorado was generated for this report through a survey of low-income populations eligible for, but not receiving, fuel assistance in Colorado. The survey was involved telephone survey of 500 individuals performed in late spring 1995. The state of Colorado has a large welfare database called COIN (Client Oriented Information

134. This statement should be modified to the extent that there is a segment of the population which is "reluctant" to take responsibility for their own plight in life. One must acknowledge that there is an attitude amongst a certain segment of the population that some things are simply not worth the effort. This population is difficult, if not impossible, to identify through surveys such as that which serves as the foundation for this Chapter. Moreover, many fuel assistance providers report that working (or attempting to work) with this population is disturbing, difficult and frustrating.

135. According to the GAO, "from a policy viewpoint, an informed decision on the part of an eligible household *not* to participate in the program is not an issue. Lack of information about the program, however, and at least some program and access problems can and should be remedied." U.S. General Accounting Office, *Food Stamps: Reasons for Nonparticipation*, at 22 (December 1988).

Network). This database contains information on individuals receiving Aid to Families with Dependent Children (AFDC), Old Age Pension (OAP), Aid to the Needy Disabled (AND), Aid to the Blind (AB), and Supplemental Security Income (SSI). In April 1995, Colorado LIHEAP staff matched COIN with current LIHEAP clients to identify individuals eligible for fuel assistance but not receiving LEAP. This resulted in a database containing nearly 70,000 households. Of this population in the database, 55 percent had telephones. From the group that had phones, researchers drew a random sample of 8,000 cases using a standard statistical computer software package. This procedure helped ensure that the sample would be representative of Colorado residents eligible for fuel assistance but not receiving LIHEAP. The results of the phone survey were recorded and used for the analysis presented below.

COMPARING THE PERSONS WHO KNOW AND THOSE WHO DON'T KNOW ABOUT LIHEAP

The Demographics: Who Does and Who Does Not Know About LIHEAP

The first two populations considered in this evaluation of LIHEAP nonparticipation involve the nonparticipants who *know* about LIHEAP on the one hand and those who do *not* know about the program on the other hand. Overall, of the 500 nonparticipants surveyed,¹³⁶ 403 knew about LIHEAP but did not apply while 97 others did not know about the program.

Age

The first important characteristic in comparing the "know" population versus the "don't know" population involves age. The population of households who don't know about LIHEAP is older than the population that does know, with the former having an average age of 42.0 years and the latter having an average of 47.4 years. Even more importantly, 30.8 percent of the "don't know" population is aged 65 and older while only 19.4 percent of the "know" population is. Only 9.2 percent of the "know" population is aged 74 and older while 20.9 percent of the "don't know" population is. Moreover, of the total nonparticipant population sampled, 25.1 percent are aged 65 and over and 14.9 percent are aged 75 and older. As can be seen, therefore, the elderly are disproportionately represented in the "don't know" population *vis a vis* both the "know" population and the total nonparticipation population. These comparisons are set forth in the Table below.

{PRIVATE }Households Over 65 Years Old Knowledge of LIHEAP	
Aged 65 and Older	Aged 75 and Older

136. Remember in this discussion, only households with telephones were surveyed. There may be a difference in the "have phone" and the "no phone" populations.

Tot Nonpart	Knowledge of LIHEAP		Tot Nonpart	Knowledge of LIHEAP	
	Know	Don't Know		Know	Don't Know
25.1%	19.4%	30.8%	14.9%	9.2%	20.9%

It is admittedly difficult to reconcile this data with the performance review above which shows that LIHEAP does an excellent job of targeting the elderly as a vulnerable population. It is not clear whether there is a true lack of information about LIHEAP, whether the "I didn't know about the program" is simply a fallback survey response used in lieu of a more accurate response, or whether some other factor is influencing the nonparticipation. Additional study of elderly non-participation in LIHEAP is warranted.

Language

The second important characteristic in comparing the "know" versus the "don't know" population involves the primary language spoken in the home. The population that doesn't know about LIHEAP has more non-English speaking households than the population that does know. More than one-in-eight households (13.5 percent) who reported not knowing about the Colorado LIHEAP program were non-English speaking, while only one-in-twelve (7.5 percent) of the population who reported knowing about LIHEAP were non-English speaking.

Perhaps somewhat surprisingly, while Spanish is the primary non-English language reported by both populations combined, over half of the non-English "don't know" population (7 of 13) were non-Spanish while only three of the 30 non-English "know" population were non-Spanish. While it is not clear that the sample of the non-English "don't know" population is big enough to consider the numbers significant, this apparent difference should give rise to a review of LIHEAP's outreach to non-English/non-Spanish speaking populations in Colorado.

Race

Race, too, is an important factor in whether or not households know about LIHEAP in Colorado. The issue is not so substantial for Colorado's Hispanic population. While nearly one-third (28.8 percent) of the households who know about LIHEAP but did not participate were Hispanic, for example, fewer than one-in-ten (8.2 percent) of those households who reported not knowing about the program were Hispanic. In comparison, 27.7 percent of the entire Colorado population below 100 percent of Poverty is Hispanic.¹³⁷

137. This does not define "low-income" the same as the LIHEAP program. Race is reported only for households at or below 100 percent of Poverty.

The situation of Blacks, however, is not quite the same. While 10.2 percent of the households who reported knowing about LIHEAP but not participating were Black, 14.4 percent of the population reporting not knowing about LIHEAP in the first instance were Black. In contrast, 7.6 percent of the entire Colorado population at or below 100 percent of Poverty is Black. As can be seen, therefore, Blacks are disproportionately represented in the nonparticipant population overall and, more specifically, within the "don't know about LIHEAP" portion of the nonparticipant population. LIHEAP should explore further why this racial disparity exists and seek to remedy it if possible.

Employment Status

The population who knows about LIHEAP is heavily oriented toward persons who are unemployed.¹³⁸ More than three-of-five (60.9 percent) of the persons who know about LIHEAP but did not participate were "unemployed." "Fulltime employment" was substantially less well-represented (12.0 percent) than part-time employment (27.1 percent).

The representation of different levels of employment status amongst the entire population of LIHEAP nonparticipants was 64 percent unemployed; 11.2 percent fulltime employment; and 24.4 percent part-time employment. It thus does not appear that employment status is an indicator of whether households will have knowledge of LIHEAP or not.

The population of people reporting that they did not know about LIHEAP, and for whom employment status data was available, was not big enough to use in drawing conclusions. The unemployment portion of the population (82.9 percent) was significantly bigger than the unemployment portion of the "know" population, with the "part-time" (9.8 percent) and fulltime (7.3 percent) populations being correspondingly smaller. Still, only 41 persons who did not know about LIHEAP reported their employment status. No meaningful conclusions can be drawn from this population.

Months at Residence

The difference in term of residence between the population who knows about LIHEAP and the population that does not is not dramatic and does not support the notion that households who are recent movers need special outreach attention to promote knowledge of the existence of the program. Of the households who reported not knowing about LIHEAP, one-in-three (33.3 percent) had lived at the current residence for 12 months or less and half (49.5 percent) had lived at their current residence for 24 months or less. However, of the households who reported knowing about LIHEAP but not participating, nearly two-in-five (38.9 percent) had lived in their current residence for 12 months or less and nearly three-in-

138. This does not mean that they are "looking for work." Whether they are seeking to be in the labor force was not solicited.

five (55.5 percent) had lived at their current residence for 24 months or less.¹³⁹

Household mobility and lack of knowledge about LIHEAP generally do not appear to have any important correlation.

Marital Status

In other contexts, marital status has been found to have a significant correlation with the lack of knowledge about particular public benefits programs. In a study of Food Stamp participation, for example, the U.S. General Accounting Office (GAO) found that the groups most likely to cite a lack of information about the Food Stamp program included most categories of households headed by single individuals.¹⁴⁰

The correlation found by GAO regarding Food Stamps nationwide holds for LIHEAP in Colorado. Unmarried households represent 13.2 percent of all nonparticipating households in the sample of LIHEAP nonparticipants, but represent 17.5 percent of the households who cite a lack of knowledge about LIHEAP as the reason for their nonparticipation. Similarly, while married households represent 47.8 percent of the total nonparticipant population, married households represent only 28.9 percent of the households who cite a lack of knowledge as being the reason for their nonparticipation. In contrast, the households who know about LIHEAP almost exactly reflect the total population of nonparticipants as a whole, with 12.2 percent of unmarried households knowing about LIHEAP (vs. 13.2 of the total nonparticipants being unmarried) and 36.0 percent being married (vs. 34.6 percent of the total nonparticipants being married).

Participation in Other Programs

One of the most effective ways to inform households of the availability of fuel assistance is through other public benefits programs. As the Table below shows, except for Medicare, the lack of knowledge about LIHEAP is virtually non-existent amongst those households who are receiving other public benefits.

139. However, as discussed in detail below, there are specific barriers to participation that do seem to be positively associated with the length of residence.

140. General Accounting Office, *Food Stamp Program: A Demographic Analysis of Participation and Nonparticipation*, at 19 (January 1990).

{PRIVATE }Knowledge of LIHEAP Distributed by Participation in Other Public Benefit Programs in Colorado						
	Total Pop		Pct Participation in Other Programs			
			Know LIHEAP		Don't Know LIHEAP	
	Number	Percent	Number	Percent	Number	Percent
SSI	154	30.8%	123	24.6%	31	6.2%
AFDC	144	28.8%	133	26.6%	11	2.2%
MEDICARE	418	83.6%	343	68.6%	75	15.0%
FOOD STAMPS	269	53.8%	240	48.0%	29	5.8%
WIC	110	22.0%	93	18.6%	17	3.4%
UNEMPLOYMENT	5	1.0%	5	1.0%	0	0.0%
OAP	78	15.6%	58	11.6%	20	4.0%
AB	3	0.6%	2	0.4%	1	0.2%
AND	27	5.4%	19	3.8%	8	1.6%
GA	41	8.2%	34	6.8%	7	1.4%

Demographics Summary

In summary, some demographics are more important than others in making a determination of who might not know about the availability of LIHEAP benefits. Based on data specific to Colorado, persons who are disproportionately represented in the populations that report not knowing about LIHEAP include persons aged 65 and older, non-English speaking households (and particularly non-English/non-Spanish speaking households), Blacks (but not Hispanics), and unmarried households. In contrast, participation in other public benefit programs has a substantial positive effect on knowledge about LIHEAP while the months of residence at a particular location and either fulltime or part-time employment appear to have little or no impact on knowledge of LIHEAP.

Energy Crises for the Two Populations

In addition to trying to find demographic characteristics that might inform us of who the households lacking knowledge of LIHEAP might be, it is important to determine whether there are energy-related characteristics that might provide insights into this population. Again, the thesis behind the analysis is that if households know about LIHEAP but choose not to participate, there is nothing for the state to do. However, if there are households who could benefit from LIHEAP, but do not know about the program, Colorado should attempt to remedy that situation. This section looks at different indicators of payment troubles to

determine whether there is a difference between the populations who know and don't know about LIHEAP.

Shutoff Notices

Low-income households receiving utility shutoff notices do, indeed, receive more information about the availability of LIHEAP benefits than those who do not. While 14.6 percent of the total nonparticipating population received a utility shutoff notice, 18.9 percent of the population who knew about LIHEAP had received a shutoff notice.¹⁴¹ In contrast, only 9.7 percent of the households who reported not knowing about LIHEAP had received a utility shutoff notice. It is reasonable to conclude, therefore, that the efforts utilities make to inform payment troubled households of the availability of fuel assistance is having a positive impact on the penetration of understanding of the program.

The question then becomes, if households know about LIHEAP, and have received a shutoff notice from their local utility (presumably indicating some type of inability to pay), *why* did they fail to apply for and receive the fuel assistance grant. Of the 64 households who received a shutoff notice and knew about LIHEAP, almost one-half (28) said simply that they "don't want money from the government." Despite their receipt of a shutoff notice, another 28 said that they "don't need any help."¹⁴² This desire not to seek help is a conscious decision. Few households cited any particular barrier. The distribution of the 64 households by barriers cited is as follows:¹⁴³

141. Of the 73 nonparticipants who had received a shutoff notice, in other words, 64 reported that they "knew about LIHEAP."

142. There is an overlap of 15 households, saying both that they don't need, and don't want, any help from the government.

143. Households could cite more than one barrier if applicable.

{PRIVATE }	
Barrier	Number of Times Cited
Difficulty in obtaining transportation to apply for LIHEAP	4
Missed LIHEAP deadlines	8
Could not understand application forms	6
Could not get help to understand LIHEAP	5
Told that were not eligible for LIHEAP	12
Thought income was too high	9
Amount of benefit "not worth the hassle"	6

While there is some overlap in the reasons cited for nonparticipation, there is not *much* overlap. Of the 64 affected households, in other words, only 12 cited more than one reason for nonparticipation. In contrast, 34 cited none and 18 cited only one reason. The distribution of the number of barriers cited by any individual household is set forth below:

{PRIVATE } Nonparticipants who Knew About LIHEAP but Did Not Participate Who Received Utility Shutoff Notice	
Number of Barriers Cited	No. HHs Citing this Many Barriers
0	34
1	18
2	6
3	5
4	0
5	1
More than 5	0

Unable to Afford

This conclusion is bolstered by comparing the reported knowledge about LIHEAP amongst households who say they "cannot afford their heating bills." While 20 percent of all nonparticipating households said they "could not afford" their home heating bills, a virtually identical proportion (21.6 percent) of the population who knew about LIHEAP reported that they could not afford their bills.¹⁴⁴

In contrast, only 13.4 percent of the households who did not know about LIHEAP reported that they could not afford their home heating bills. Presumably, these latter households are households who, indeed, have fewer problems paying their home energy bills and, as a result, fewer incentives (or reasons or opportunities) to seek out information about an energy assistance program.

Of the 87 households who knew about LIHEAP and did not apply despite having reported that they "could not afford" their home heating bill, 33 said that they don't want money from the government while 26 said they did not need help.¹⁴⁵ The perception of barriers to participation was somewhat higher in this population as shown below.

{PRIVATE }	
Barrier	Number of Times Cited
Difficulty in obtaining transportation to apply for LIHEAP	6
Missed LIHEAP deadlines	11
Could not understand application forms	17
Could not get help to understand LIHEAP	14
Told that were not eligible for LIHEAP	17
Thought income was too high	10
Amount of benefit "not worth the hassle"	6

There is a somewhat higher count of multiple barriers cited in this population of LIHEAP nonparticipants as well. Of the 87 households, 24 cited more than one barrier as preventing

144. Of the 100 nonparticipants who reported that they could not afford their home energy bill, 87 reported also that they knew about LIHEAP.

145. There was an overlap of 13 households saying they did not want, and did not need, government assistance.

their application for LIHEAP. Nonetheless, more than half reported no barrier, and nearly one-quarter cited only one barrier. The distribution is set forth below.

{PRIVATE }Nonparticipants who Knew About LIHEAP but Did Not Participate Who Reported Unaffordable Home Heating Bill	
Number of Barriers Cited	No. HHs Citing this Many Barriers
0	44
1	19
2	12
3	7
4	2
5	3
More than 5	0

Disconnection of Service

Finally, of the 500 households surveyed, 15 reported that they had faced the actual termination of utility service. Of those 15 households, 14 reported that they knew about LIHEAP while only one did not. Without addressing the issue of why households might have chosen not to participate in LIHEAP even though they faced the disconnection of utility service, it is evident that there is a substantial penetration of information about LIHEAP to that population facing service terminations.¹⁴⁶

It is difficult to draw many conclusions from a sample involving only 15 households. Still, we find that of the 15 households who had service disconnected, seven said they did not want money from the government while five said they did not need money. The distribution of barriers amongst the 15 households who had service disconnected is as follows:

146. While the sample is smaller, similar numbers appear for households who "ran out of fuel oil." Of the nine households reporting having run out of fuel oil, seven reported that they knew about LIHEAP.

{PRIVATE }	
Barrier	Number of Times Cited
Difficulty in obtaining transportation to apply for LIHEAP	2
Missed LIHEAP deadlines	1
Could not understand application forms	2
Could not get help to understand LIHEAP	2
Told that were not eligible for LIHEAP	3
Thought income was too high	0
Amount of benefit "not worth the hassle"	2

Energy Crisis Summary

The primary importance of the discussion above as to LIHEAP reform does not lie with the number of households who choose not to participate in the program despite their knowledge of the program. The primary importance lies with the number of persons who report barriers that prevent their participation irrespective of their knowledge of the program. Despite the efforts by LIHEAP to minimize factors that might interfere with LIHEAP participation,¹⁴⁷ reported barriers to participation are many. A misunderstanding of the eligibility requirements (mistakenly believed that they were not eligible or that their income was too high), "process" problems (application forms too complicated or inability to obtain needed assistance in applying), and physical access problems (transportation unavailable), are all barriers that need to be further considered for resolution.

There are, however, important lessons to be learned from the data on people choosing not to participate. In order to expand low-income participation in the Colorado LIHEAP program, the benefits must be viewed by the population more in the nature of workers compensation, unemployment insurance, or social security. Rather than being viewed as a public benefits program, it should be structured and delivered as though households are simply getting back what they put into it.

Given the number of households above who cite the facts that they have negotiated payment plans due to an inability to pay, as well as given the fact that the households who were

147. The majority of low-income households receive an application in the mail, along with a return envelope. No personal interview or filing of the application is necessary. Households simply have to complete the application, attach the needed verification, and mail it in.

surveyed are participants in other public assistance programs, there would seem to be an infrastructure upon which to build to ensure that households who know about LIHEAP, and desire to participate, are not excluded due to some extraneous barrier such as those listed above. The answer may well lie as much with the creation of innovative partnerships in allowing outreach and intake as in any fundamental reworking of the LIHEAP network.¹⁴⁸

The Outreach Dilemma

There is an inherent dilemma in identifying a specific LIHEAP non-participant population that might be brought into the program through additional outreach. It is not unreasonable to question how much outreach LIHEAP can really afford to do. The dilemma, of course, is created by reduced funding. Even given existing participation levels, reductions in federal funds have caused reductions in benefits and sharply reduced months during which the program operates at all. Increased outreach would not only divert funds from benefits to support the outreach efforts, but would likely create a demand for benefits that could not be met. This discussion does not even purport to solve this conflict.

Household Response to Payment Problems

The third question to be examined involves to what extent, if at all, knowledge about LIHEAP is associated with other aspects of low-income household behavior toward inability-to-pay. The data below does not allow for conclusions as to the existence of a causal relationship or, should a causal relationship exist, the direction in which the causation flows.

The Colorado data supports the conclusion that households who have a knowledge about LIHEAP are more likely to seek to work out a payment plan with their local utility in the event of inability-to-pay.¹⁴⁹ While nearly one-in-three households (32.8 percent) who reported knowing about LIHEAP also reported that they worked out a payment plan, only 21.6 percent of the persons who reported *not* knowing about LIHEAP reported working out a payment plan.

Knowledge of LIHEAP, also, is positively associated with making partial payments when an inability to pay utility bills arises. Nearly one-quarter (22.8 percent) of the population which knows about LIHEAP made a partial payment, while only 12.4 percent of the population which did not know about LIHEAP made a partial payment.

148. A further examination of the demographics of persons who cite each specific participation barrier is set forth below.

149. Again, however, it might well be that the statement more accurately would note that households who seek to work out payment plans are more likely to have a knowledge about payment plans. The direction of the association is indeterminable based on the available data.

Finally, of the 403 households who reported knowing about LIHEAP, 23.1 percent reported either "doing nothing" in response to their inability to pay or "postponing payment." In contrast, 18.6 percent of the households who did not know about LIHEAP reported either "doing nothing" or "postponing payment" in response to their inability-to-pay. There appears to be no correlation in these responses.

It is important to remember that in all of these instances, the population studied involves LIHEAP nonparticipants. It is not the case that people who "know about" LIHEAP applied for and received LIHEAP. Indeed, this population failed (or refused) to apply for LIHEAP notwithstanding their knowledge of its existence.¹⁵⁰

Summary as to Household Responses

The final lesson from a comparison of nonparticipating is not particularly profound, but it is important nonetheless. The greater the contact between a payment-troubled household and either the utility or the state fuel assistance network, the more likely it is that the household who is facing payment-troubles will be able to work out a payment plan or partial payment with the utility. In this regard, it would seem not to matter whether a household learns of LIHEAP through its contact with the utility in negotiating a payment plan or *vice versa* (negotiates a payment plan because of its contact with LIHEAP).

SPECIFIC BARRIERS TO LIHEAP PARTICIPATION OTHER THAN PROGRAM KNOWLEDGE

This part of the evaluation of LIHEAP nonparticipants concentrates its attention on particular populations who do not participate in LIHEAP. Amongst the populations who are disproportionately represented in nonparticipants are the elderly and Hispanics.¹⁵¹ This Section differs from the first section which looks only at knowledge of the availability of the LIHEAP program generally.¹⁵²

Elderly Non-Participation

150. Therefore, it is not possible to conclude that persons who knew about LIHEAP made partial payments because they knew that LIHEAP would help cover the unpaid portions of the bill. These households knew about, but did not apply for, LIHEAP.

151. "Disproportionately" means that the incidence of these groups in the LIHEAP nonparticipation sample is higher than the incidence of the groups in the Colorado population as a whole.

152. In a sense, "transportation" problems represent a communications problem as well. Clients do not have to go to a LIHEAP office to apply for assistance. Everything necessary can be done through the mail. Moreover, county LIHEAP staff will make home visits to help homebound applicants fill out the form. "Transportation problems" should not exist for Colorado's potential LIHEAP applicants.

As is commonly suspected, the elderly of Colorado are disproportionately represented in the population of persons who do not participate in LIHEAP. This conclusion is based upon a comparison of the ages of nonparticipants who were interviewed for this project to the ages of all households who live at or below 100 percent of Poverty.¹⁵³ The Table below sets forth that comparison.

{PRIVATE }Age Ranges of LIHEAP Nonparticipants vs. Age Ranges in Total Population Below 100 Percent of Federal Poverty Level for Persons Aged 18 and Older		
Age Ranges	Total Population Over Age 18	LIHEAP Nonparticipants Over Age 18
0 - 17	N/A	0%
18 - 44	69.9%	64.2%
45 - 59	12.0%	8.7%
60 - 74	10.8%	15.7%
75+	7.3%	11.4%

As this Table shows, the elderly population is over-represented in the LIHEAP nonparticipant population. While persons aged 60 - 74 represented only 10.8 percent of Colorado's total population at or below 100 percent of Poverty, those persons represented almost 16 percent of the LIHEAP nonparticipants. While persons aged 75 and older represent only 7.3 percent of Colorado's total population at or below 100 percent of Poverty, they represent more than 11 percent of the LIHEAP nonparticipant population.

The question thus becomes "why?" What is it about the older population that prevents their participation? If, there are barriers that prevent participation, which barriers can be overcome, the state has an obligation to act. In this respect, the perceived stigma of taking social services is considered a "barrier" for purposes of this analysis.

Barriers to Elderly Population in LIHEAP

While the data is not entirely consistent, the elderly nonparticipants in LIHEAP do experience ongoing problems with payment of their utility bills. Of the 131 nonparticipants in the sample, more than 12 percent (16) reported that they could not afford to pay their

153. The comparison is not exact, since some members of the population which was interviewed may have incomes that exceed 100 percent of Poverty. Nonetheless, the comparison is close enough to reach conclusions.

utility bills. The data is "inconsistent" because a significantly higher number of elderly households reported that they had entered into payment plans due to an inability to pay (23) or had received information about the availability of public assistance (31).¹⁵⁴ In total, 47 of the 131 elderly nonparticipants reported taking some specific action in response to an inability to pay utility bills.¹⁵⁵

The reasons elderly households do not participate in LIHEAP can be broken down into four broad regimes. At the top, by far the biggest reason for nonparticipation (88 of 131) is the belief by elderly households that they do not need the assistance. A second broad band of elderly households cite either a refusal to take money from the government (44 of 131) or a lack of knowledge of the program (23 of 131). A third band of reasons includes problems with making applications and understanding program requirements (23 of 131) and a misunderstanding of their eligibility for the program (29 of 131). A final band includes a wide variety of reasons, ranging from an inability to obtain transportation to apply for assistance to a belief that the program is "not worth the hassle." The reasons cited by Colorado's elderly nonparticipants are set forth below.

154. However, since this sample was of *non*participants, these households who received information did not act upon that information.

155. An explanation for the apparent discrepancy is that households might have had problems at a particular time without having such ongoing problems that they would respond that their bills were "unaffordable."

{PRIVATE }Reasons for LIHEAP Nonparticipation Cited by Colorado's Elderly Population (Age 60+)		
Reason	Number Cited	Percent Cited
Could not find out about LIHEAP	3	2.3%
Could not obtain transportation to apply	2	1.5%
Missed application deadline	6	4.6%
Could not understand application forms	13	9.9%
Could not obtain help in applying	10	7.6%
Told were not eligible for LIHEAP	17	13.0%
Thought income was too high	12	9.2%
LIHEAP "not worth the hassle"	4	3.1%
Don't want money from government	44	33.6%
Don't need any help	85	64.9%
Total Unduplicated	131	
NOTE: The "number cited" may be more than 131 since each non-participating household could cite more than one reason for nonparticipation.		

There is no particular reason to disbelieve the statements by the elderly households who state that they "don't need any help." Of those 85 households, only five said in response to a different question that they could not afford to pay their utility bills, only two said that they had received shutoff notices, and none said that they had experienced a disconnection of service. However, when queried whether they had seasonal problems, 30 of the 85 indicated that winter bills posed an affordability problem.¹⁵⁶

Contrary to popular wisdom, the elderly did not disproportionately reject LIHEAP because they "did not want money from the government." While 33.6 percent of the elderly nonparticipant population cited this reason, more than 40 percent of the total nonparticipant

156. There could be several interpretations to this data. On the one hand, it could be that these respondents were saying simply that winter bills posed the biggest problem *relative to other seasons* (while nonetheless still being affordable). On the other hand, they could have been saying that winter bills did, in fact, pose significant affordability problems.

population cited it. Moreover, the elderly did not disproportionately believe that they "did not need help." While 64.9 percent of the elderly population cited this reason, so, too, did 62.2 percent of the total population cite it as well.

Indeed, if some lesson were to be learned from the elderly reasons for nonparticipation, it is that there is a systematic communications breakdown between the LIHEAP program and the elderly population. The Table below sets forth the percent of households who cited each reason for the total nonparticipant population as well as for the elderly nonparticipant population. Note that there seems to be a clear pattern of where the elderly are overrepresented in the reasons cited:

- o Could not understand application form
- o Could not obtain help in applying
- o Told were not eligible for LIHEAP
- o Thought income was too high

Each of these reasons involves *information*, either mis-information or the lack of information. This type of barrier should be subject to remedy by the state.

{PRIVATE }Reasons for LIHEAP Nonparticipation Cited by Colorado's Elderly Population (Age 60+)		
Reason	Percent Total Population	Percent Elderly
Could not find out about LIHEAP	4.2%	2.3%
Could not obtain transportation to apply	2.8%	1.5%
Missed application deadline	5.6%	4.6%
Could not understand application forms	7.2%	9.9%
Could not obtain help in applying	5.8%	7.6%
Told were not eligible for LIHEAP	11.0%	13.0%
Thought income was too high	8.4%	9.2%
LIHEAP "not worth the hassle"	3.4%	3.1%
Don't want money from government	40.4%	33.6%
Don't need any help	62.2%	64.9%

Nonparticipation by Race

Neither Hispanics nor Blacks are substantially overrepresented in the population of LIHEAP nonparticipants surveyed for this report. While the survey found that Blacks were perhaps somewhat overrepresented amongst nonparticipants, Hispanics were not. The research found that 9.6 percent of the nonparticipants were Black, while Blacks represent 7.9 percent of the total population in Colorado. In contrast, 25.4 percent of the LIHEAP nonparticipants were Hispanic, while Hispanics comprise 27.7 percent of Colorado's total population.¹⁵⁷

The totals, however, may not be as illuminating as the breakdown of reasons regarding why Black and Hispanic households do not participate in LIHEAP. The Table below shows the percentage of the total population citing each reason for nonparticipation, the total of the Black/Hispanic combined population, and the Black and Hispanic population broken out individually. The Table is disturbing because Hispanics, like the elderly, are citing reasons for nonparticipation that primarily involve inadequate information. If, indeed, the lack of

157. There is some belief amongst service providers that one reason for under-representation by Hispanics involves the fear of illegal Hispanics to apply for social services.

adequate (or accurate) information is a barrier to participation, even if Hispanics are not under-represented generally (as measured by their proportion of the total population), the barriers should be addressed and participation increased.

Hispanics are disproportionately over-represented with respect to four different barriers to LIHEAP participation:

- o Understanding application forms;
- o Obtaining help in applying;
- o Misperception of eligibility; and
- o Perceptions of income eligibility

In each of these cases, the barrier to participation involves inadequate or inaccurate communications received by the household. These barriers should be resolvable. Non-participation attributable to these barriers should be made close to zero.

Employment Status

The LIHEAP nonparticipant population mirrors Colorado's public assistance participation in the extent to which persons are employed. While there is a significant population for whom the employment status is unknown, it is possible to work with the remaining cases. Of those households, LIHEAP nonparticipants include 11.3 percent who are employed fulltime, 24.4 percent who are employed part-time, and 64.3 percent who are not employed.¹⁵⁸

There are not significant barriers to participation in LIHEAP for persons who are employed either part-time or fulltime.¹⁵⁹ As the Table below shows, while both of these groups of workers have substantial percentages who say that they do not need LIHEAP or do not want to take money from the government, there are relatively minor barriers reported that prevent workers who want assistance from obtaining it.

158. Within Colorado's broader public assistance population, the data shows that 9.5 percent are employed fulltime, 26.2 percent are employed part-time, and 64.2 percent are not employed.

~~159. The category of "unemployed" was not further studied since it did not distinguish between were and were not seeking to be in the labor force.~~

{PRIVATE }Reasons for LIHEAP Nonparticipation by Race								
Reason for Nonparticipation	Total Population		Total Black/Hispanic		Blacks		Hispanics	
	No.	Pct.	No.	Pct.	No.	Pct.	No.	Pct.
Could not find out about LIHEAP	21	0.042	6	0.034	2	0.042	4	0.032
Could not get transportation to apply	14	0.028	4	0.023	0	0.000	4	0.032
Missed application deadline	28	0.056	8	0.046	1	0.021	7	0.055
Could not understand application forms	36	0.072	13	0.074	1	0.021	12	0.095
Could not obtain help in applying	29	0.058	12	0.069	1	0.021	11	0.087
Told were not eligible for LIHEAP	55	0.110	23	0.131	4	0.083	19	0.150
Thought income was too high	42	0.084	14	0.080	1	0.021	13	0.102
LIHEAP "not worth the hassle"	17	0.034	4	0.023	0	0.000	4	0.032
Don't want money from government	202	0.404	62	0.354	13	0.271	49	0.386
Don't need any help	311	0.622	101	0.577	34	0.708	67	0.528
Totals	500		175		48		127	

{PRIVATE }Barriers to LIHEAP Participation for Workers Employed Fulltime or Part-time in Colorado				
Barrier to Participation	Fulltime Worker		Part-time Worker	
	Number	Percent	Number	Percent
Did not know of program	1	0.033	5	0.077
Could not find out about LIHEAP	0	0.000	1	0.015
No transportation to apply	2	0.067	5	0.077
Missed application deadline	3	0.100	3	0.046
Did not understand application form	2	0.067	3	0.046
Could not obtain help in applying	1	0.033	3	0.046
Told were not eligible	1	0.033	4	0.062
Thought income was too high	0	0.000	3	0.046
LIHEAP "not worth the hassle"	1	0.033	2	0.031
Don't want money from government	19	0.633	27	0.415
Don't need any help	19	0.633	37	0.569
Total	30		65	

Recent Mobility

The length of time at which households have lived at their current residence affects the barriers which those households cite to LIHEAP participation. The data in Colorado lends support to the concept of "effective knowledge" and "effective access" first advanced in a study of LIHEAP nonparticipation in Pennsylvania in 1988.¹⁶⁰ According to that study, "while most consumers indicate awareness of energy assistance, in general, their knowledge is not sufficient to allow them to act. Almost half of those who say they 'know about' energy assistance cannot name a single program."¹⁶¹ The study found that fifty-four percent of the respondents were either aware of energy assistance but could not name a specific program, or were unaware of any programs in 1985.

The Penn State study found that consumer knowledge of the existence of energy assistance and conservation programs "is not very extensive.* * *Most consumers do not have effective knowledge about those programs which exist."¹⁶² It then concluded that "people who are unaware of programs or cannot name an agency which they can contact for assistance most likely do not have effective access to help when they need it."¹⁶³

What the data in Colorado adds to these Pennsylvania insights is that the barriers presented by the lack of "effective knowledge" are positively related to the length of residence at a particular location. The Table below compares the barriers cited by Colorado LIHEAP nonparticipants who have lived at their current location for 1 - 24 months to those nonparticipants who have lived at their current location for 36 or more months. As the numbers show, while the knowledge of the LIHEAP program generally does not vary based on length of residence, persons who have lived at their current residence for a shorter period of time more frequently cite, as reasons for LIHEAP nonparticipation, having trouble finding out about LIHEAP, not being able to find transportation to apply for LIHEAP, missing application deadlines, and not being able to find help in applying for LIHEAP. These factors seem to be positively associated with "newness" to an area and the lack of "effective knowledge" as cited in Pennsylvania.

Indeed, given the fact that fewer households with residence periods of 24 months or shorter said that they "did not know of LIHEAP" than households with longer residence periods

160. Drew Hyman, *Consumer Budget Priorities and Utility Payment Problems in Pennsylvania*, prepared by Consumer Services Information System Project (Penn State University) for the Pennsylvania Public Utility Commission (1988).

161. *Id.*, at 22.

162. *Id.*, at 27 - 28.

163. *Id.*, at 22.

(17.5% vs. 22.0%), the theory of "effective knowledge" becomes even stronger.

{PRIVATE }Barriers to LIHEAP Participation for Recently Mobile Households in Colorado				
Barrier to Participation	1 - 24 Month Residence		36+ Month Residence	
	Number	Percent	Number	Percent
Did not know of program	46	0.175	39	0.220
Could not find out about LIHEAP	13	0.049	4	0.023
No transportation to apply	8	0.030	3	0.017
Missed application deadline	16	0.061	7	0.040
Did not understand application form	16	0.061	11	0.062
Could not obtain help in applying	16	0.061	9	0.051
Told were not eligible	23	0.088	26	0.147
Thought income was too high	23	0.088	14	0.079
LIHEAP "not worth the hassle"	10	0.038	3	0.017
Don't want money from government	113	0.430	73	0.412
Don't need any help	158	0.601	118	0.667
Total	263		177	

Summary as to Barriers

Not surprisingly, different populations of low-income Colorado households face different barriers to participation in the federal fuel assistance program. Aged households, who are disproportionately represented in the group of LIHEAP non-participants, primarily cite information problems.¹⁶⁴ In contrast, however, contrary to conventional wisdom, the elderly

164. One future investigation should be to further explore the relationship between a low-income household's decision that it "doesn't need any help" and the lack of information. The fear by some service providers is that some information problems are masked by the response that a household simply "doesn't need any help."

did not disproportionately reject fuel assistance because they did not want to take money from the government.

While an initial examination of LIHEAP nonparticipants would lead to the conclusion that race is not a factor in program participation, a closer look yields quite different conclusions. The initial research of LIHEAP nonparticipation involved telephone surveys. In Colorado, however, both Blacks and Hispanics are disproportionately represented in the population of households lacking telephones in their homes. A look at that no-phone population finds that a lack of fuel participation comes in association with the lack of telephone service. The lack of telephones in the home, in other words, is, unto itself, a barrier to LIHEAP participation. Given the disproportionate representation of Blacks and Hispanics in the no-phone population, there is a corresponding degree of nonparticipation in LIHEAP.

The mobility of Colorado's low-income households also creates barriers to LIHEAP participation. This conclusion is consistent with prior research in other states. One impediment to participation in fuel assistance elsewhere is the lack of what has been termed "effective knowledge." Barriers associated with program knowledge (or lack thereof) are positively associated with recent residency. Given the barriers cited by households who have lived at their current residence for 24 months or less, in other words, the theory of "effective knowledge" as a barrier to LIHEAP participation has been confirmed in Colorado.

Finally, the presence of either part-time or full-time employment was not associated with any particular barriers to LIHEAP participation. While both groups of workers (part-time and full-time) have substantial percentages who say that they either do not want or do not need LIHEAP, these workers do not report major barriers to participation should they seek to obtain it.

LIHEAP NONPARTICIPATION AND INABILITY-TO-PAY

This section examines the nonparticipation in LIHEAP of households who reported that within the last year, they faced a situation where they could not afford to pay their utility bills. Of the 500 persons interviewed, 100 persons reported this inability-to-pay.¹⁶⁵ Nine of these 100 households reported that they had experienced an actual disconnection of service.

The persons reporting that they could not afford to pay their utility bills at least once during the past year cited a variety of barriers to their participation in LIHEAP. No particular barrier received dramatically more attention than others, although the inability to understand

165. In addition, 73 persons reported having received a disconnect notice, 42 of which overlapped with the 1100 who reported an inability to pay. Finally, 15 persons reported an actual disconnection of service. The "could not afford" population was chosen for analysis because the client perception of inability to pay seems to relate more directly to participation in LIHEAP than does the receipt of a shutoff notice (which may be issued irrespective of an ability to pay a particular bill).

LIHEAP application forms and the fact that particular households were reportedly told they were not eligible for LIHEAP were cited moderately more times than other barriers. A distribution of barriers cited by households is set forth below.

{PRIVATE }Barriers to LIHEAP Participation for Colorado LIHEAP Nonparticipants Reporting An Inability to Pay Utility Bills		
	Number	Percent
Could not find out about LIHEAP	7	0.049
Could not obtain transportation to apply	7	0.030
Missed application deadline	11	0.061
Could not understand application form	18	0.061
Could not obtain help in applying	14	0.061
Told were not eligible	17	0.088
Thought income was too high	10	0.088
LIHEAP "not worth the hassle"	6	0.038
Don't want money from government	38	0.430
Don't need any help	32	0.601
Total	100	

As with much of the analysis of other populations, the primary barriers other than a lack of knowledge of LIHEAP generally (which was discussed in detail in the first Section above) involved a lack of adequate and accurate information. The five barriers to LIHEAP participation that were most commonly cited by households who reported an inability to pay include:

- o Missing LIHEAP application deadlines;
- o Not being able to understand LIHEAP application forms;
- o Not being able to obtain help in applying for LIHEAP;
- o Being told they were not eligible for LIHEAP; and
- o Thinking their income was too high to be eligible for LIHEAP.

As stated above, these particular barriers involve the provision of information, and should be subject to remedy by the State.

Interestingly, a substantial minority of the households surveyed indicated that they either did not *need* help or did not want help from the government despite the fact that they reported not being able to afford their utility bills. Of the 32 households saying that they did not need any help, 13 received a shutoff notice and three (3) ultimately had service disconnected.

NONPARTICIPATION IN PRIVATE ASSISTANCE PROGRAMS

The overwhelming message regarding non-participation in private fuel assistance programs in Colorado is the lack of common knowledge about such programs. Of the 500 households surveyed (all of whom were nonparticipants in the federal fuel assistance program), 415 (83 percent) reported that they did not know about available private fuel assistance programs.¹⁶⁶ Moreover, even of those who *did* know, the private programs were not reaching a population not already informed of LIHEAP. Of the 84 households who knew about some private assistance program, 77 also reported knowing about LIHEAP as well. Only seven households (1.4%), therefore, knew about private programs even though they had no knowledge of LIHEAP.¹⁶⁷

Looked at conversely, the lack of information about private assistance programs is widespread even among those households who know about LIHEAP. Of the 500 non-participants --and remember, all of these households are non-participants in LIHEAP-- 326 reported knowing about LIHEAP while at the same time *not* knowing about private assistance programs.

Private assistance does somewhat fill in a gap for those households who say that they simply do not want to take money "from the government." Of the 202 households who said they did not apply for LIHEAP benefits for this reason, 47 indicated that they knew about private assistance alternatives. Of those 47, however, 36 reported that they did not need assistance.

Other than the lack of information, no particular barrier was reported that prevented households from obtaining private fuel assistance. A scattering of households reported

166. Because of the near universal lack of knowledge about the private assistance programs, further breakdowns of the populations who did and did not know about these programs did not yield helpful information. The analysis found, in other words, that instead of missing discrete sub-populations, the private assistance programs were missing almost everyone.

167. This dual knowledge could work two ways, of course. On the one hand, it might be that households learn about private programs and LEAP through the same networks and, therefore, if they knew of the private program they also knew of LEAP. On the other hand, the data could simply indicate that when publicity is provided as to private programs, that publicity says "you must apply for LEAP first." The discussion of the requirements imposed by private assistance programs above, however, did not find a significant number who required an application for LEAP to be a prerequisite for receipt of the private assistance.

having problems with obtaining transportation to apply for such assistance (n=7), having trouble understanding application forms (n=7), not being able to obtain assistance with making an application (n=6) or mistakenly believing they were ineligible, either because their income was too high (n=8) or because they owned a car or home (n=5). This low reporting of barriers, however, could well simply reflect the lack of experience with private assistance programs and, therefore, the lack of any basis to report a barrier to participation.

The lack of public information about private assistance programs should not necessarily be construed as a failing on the part of these service providers. The discussion above regarding private assistance programs in Colorado indicates that much, if not most, of the assistance is provided on a limited, and quite localized, basis. Rather than providing extensive public information about the general availability of such programs, in other words, the private programs take quite limited funds and make them available on an as-needed basis. Indeed, in responding to requests for information about their programs, several programs requested that they not be listed in any type of directory of assistance agencies, since their human and financial resources simply were not designed to address that type of need.

NONPARTICIPATION INCLUDING NO-PHONE POPULATION

In addition to the random telephone survey of LIHEAP nonparticipants, this study undertook a non-random survey of persons having various contacts with social service agencies. The additional survey was intended to capture data on households who lacked telephones in addition to those who did not. The belief was that this no-phone population might possibly have characteristics that would distinguish them from the population with telephones.

The second survey of low-income households was performed through local social service agencies. These agencies included food banks, legal services offices, Head Start programs, and the like. Persons administering the survey spoke with 422 individuals. Since the survey is non-random, the results cannot be statistically projected to the low-income population as a whole. The intent of the survey, however, was not to develop precise statistical data on nonparticipants, but rather to gain policy insights into the nonparticipant population.

Nonparticipation in LIHEAP

Even though the households who were participants in the survey had some contact with local social service agencies, they overwhelmingly did *not* participate in the fuel assistance program. Of the 422 households surveyed, 367 (87 percent) were not currently receiving fuel assistance through LIHEAP. This analysis will focus on these 367 households.

The factor contributing to nonparticipation does not represent a lack of knowledge about the existence of the LIHEAP program. Of the 367 nonparticipants, 262 of them reported that they "knew about" LIHEAP, 131 reported that they had filled out an application for LIHEAP in the past, and 97 reported that they had actually received LIHEAP in the past. There is

substantial, but not complete, overlap amongst these populations. Roughly half (128 of 262) of the households reporting that they "knew about" LIHEAP indicated that they had neither applied for that assistance nor received it in the past.

Given this knowledge about the existence of LIHEAP, it is even more important to inquire into the barriers, if any, that might prevent households from applying for this assistance. These barriers fall into three levels of problems. The most commonly cited barriers involved misperceptions regarding eligibility. Of the 262 nonparticipants who had a knowledge about LIHEAP, households indicated most frequently that they either had been *told* they were ineligible for LIHEAP (67) or had thought they were ineligible for LIHEAP because their income was too high (76). A smaller, yet still substantial, group said they thought they were ineligible for LIHEAP because they owned a house or car (42).

A second level of problems involved more physical barriers to participation in LIHEAP. Again within the population who knew about LIHEAP but did not participate, some households reported that they had trouble getting to the place where they were required to apply for LIHEAP (35) while others reported that they were unable to meet the deadlines for applying for LIHEAP (39).

Problems with the application process, itself, did not appear to be common. Only 12 persons reported that they were unable to understand the questions on the application form or "needed help" filling out the LIHEAP application form and nobody was there to provide it.

Finally, many households (31) indicated simply that the amount of money available through LIHEAP was not worth the hassle of applying. A much larger number of LIHEAP nonparticipants indicated that they did not want to take money from the government (106) while a similar substantial population (108) reported that they did not need help with their heating bill.

There is some incongruity in these responses. Of the 108 households who reported that they did not need help paying home heating bills, 10 had received disconnect notices within the last 12 months, while five (5) had actually experienced a disconnection of service.¹⁶⁸ Similarly, of the 106 persons who reported not wanting to take money from the government, 10 had received a disconnect notice within the last 12 months while six (6) had experienced a service disconnection. Of the 31 respondents who said that the amount of LIHEAP assistance was not worth the hassle of applying, three (3) had received shutoff notices while only one (1) had experienced a service disconnection.

168. For this purpose, a "service disconnection" includes running out of fuel oil, propane or wood.

{PRIVATE }Reasons for LIHEAP Nonparticipation Amongst Households Who Knew About LIHEAP: Colorado		
Reason for LIHEAP Nonparticipation	Number	Pct
Trouble finding out about LIHEAP	50	19%
Trouble getting to place where you needed to apply for LIHEAP	35	13%
Unable to meet deadlines for applying	39	15%
Unable to understand questions on application form	12	4%
Needed help filling out application--none available	12	4%
Told were ineligible	67	25%
Thought ineligible because income too high	76	28%
Thought ineligible because own car or house	42	16%
Amount of money not worth the hassle	31	12%
Don't want to take money from government	106	40%
Didn't need help with heating bills	108	40%
NOTES:		
Total nonparticipant population who knew about LIHEAP is 262 households.		

Unlike what was expected, the lack of a telephone in the respondent's home was not a major factor associated with knowledge about LIHEAP. Of the 267 households not participating in LIHEAP, 43 lacked telephone service in their home. However, of those 43 households, most (35) still "knew about" LIHEAP and more than half had either filled out a LIHEAP application in the past (25) or had actually received LIHEAP in the past (24).

Responses by the nonparticipant population that lacked telephone service in the home were surprising as well in the lack of barriers which were cited as a reason for nonparticipation. Indeed, the proportion of households citing any particular barrier was substantially smaller in the no-phone population than in the nonparticipant population as a whole. Again, while due to the non-random nature of the sample for this research, it is inappropriate to statistically compare the populations, the disparity in responses is so substantial to merit attention. No explanation for the lack of barriers is evident from the data developed in this particular survey. Perhaps the process of receiving LIHEAP in Colorado is not dependent upon having a telephone in the home. Perhaps those persons who lack telephone service, but

who nonetheless reach other service providers,¹⁶⁹ have found a way to compensate for not having a telephone in the home. Perhaps the presence of a telephone in the home is not as important of a factor as was first postulated by researchers. It is not possible to use the data from this research to draw conclusions as to these possibilities.

{PRIVATE }Reasons for LIHEAP Nonparticipation Amongst Nonparticipants Who Lack a Telephone in the Home		
Reason for LIHEAP Nonparticipation	Number	Pct
Trouble finding out about LIHEAP	4	2%
Trouble getting to place where you needed to apply for LIHEAP	5	2%
Unable to meet deadlines for applying	1	0%
Unable to understand questions on application form	1	0%
Needed help filling out application--none available	3	1%
Told were ineligible	5	2%
Thought ineligible because income too high	2	1%
Thought ineligible because own car or house	3	1%
Amount of money not worth the hassle	8	3%
Don't want to take money from government	1	0%
Didn't need help with heating bills	4	2%
NOTES:		
Total no-phone population is 43 households.		

Notwithstanding the impact of the lack of telephones in the home on receipt of fuel assistance, there is disturbing data regarding the lack of telephones and the loss of utility service. Of the 43 household no-phone population, roughly 1-in-3 (13) had received a shutoff notice and roughly 1-in-5 (8) had experienced an actual disconnection of service within the past 12 months. Indeed, the 13 members of no-phone population who had received a shutoff notice came from a total population of only 39 nonparticipants who had received such disconnect notices overall. Even more disturbing, the eight (8) members of the no-phone population who had experienced an actual service disconnection came from a

169. Remember, this survey was taken of persons having contact with other social service providers, such as food banks, and the like.

total population of only 22 nonparticipants who had experienced a disconnection overall. This means that the no-phone population was significantly over-represented in both the disconnect notice population as compared to the total nonparticipant population (33 percent vs. 16 percent) as well as in the population experiencing a disconnection of service (36 percent vs. 16 percent). Again, one must be careful to realize that the survey involved a non-random sample. In addition, the sample size of households receiving shutoff notices, or actually experiencing a service disconnection, is small. Nonetheless, the apparently high proportion of no-phone households experiencing payment problems gives rise to concern.

Nonparticipation in Private Fuel Assistance

Setting aside LIHEAP assistance for the moment, we turn attention next to private fuel assistance (not involving LIHEAP). The reasons for nonparticipation in private fuel assistance differ significantly between LIHEAP and private sources of dollars. Unlike LIHEAP, knowledge of which was almost universal, very few households knew of private assistance. Of the 422 respondents to the survey, only 77 (18 percent) knew that private cash assistance was available. Indeed, of the 284 respondents who knew about LIHEAP overall, only 70 *also* knew about the existence of private sources of dollars.

This section will first focus on the group of respondents who knew about private sources of fuel assistance. Within the group of households who knew about private assistance, a much higher percentage had actually asked for (and received) it than within the population who knew about LIHEAP. Of the 77 respondents reporting a knowledge of private assistance, 30 (39 percent) had asked for it and 27 (35 percent) had received it. It is *not* the case, however, that these households are being funneled to private assistance as a mechanism to avoid the disconnection of service. Of the 30 persons who had asked for private assistance, only seven (7) had received a disconnect notice within the past 12 months; only three (3) had actually experienced a disconnection of service.

Nor is it the case that households who do not want to take money from the government routinely seek out private sources of assistance as an alternative to the public benefit. Of the 106 persons reporting that they did not wish to take government money, only 27 "knew about" sources of private fuel assistance dollars.

In contrast to the households who did know about private sources of dollars are those households who did not. The lack of a telephone in the home is not an issue for this population. Only 36 of the 310 households who did not know about private assistance were without telephone service in the home. Nor was language a problem. 288 of the 310 households spoke English as their primary language. Nor was length of residence particularly associated with the lack of knowledge of private funding sources. The proportions of households lacking knowledge of private fuel funds as distributed by length of residence is virtually identical to the proportion of households distributed by length of residence in the overall population not participating in LIHEAP.

{PRIVATE }Length of Residence at Current Home: Total Nonparticipants vs. Households Lacking Knowledge of Private Assistance				
Length of Residence	Total Nonparticipants (n=367)		Lack Private Fuel Knowledge (n=310)	
	No.	Pct	No.	Pct
0 - 6 months	113	31%	92	30%
7 - 12 months	65	18%	52	17%
13 - 18 months	49	13%	44	14%
19 - 24 months	21	6%	21	7%
More than 2 years	119	32%	100	32%

In sum, there appears to be no particular barrier to gaining knowledge about, and then applying for, private sources of fuel assistance. While knowledge of such programs is limited at best, there are not particular populations that are being missed. Presumably what this means is that private sources of fuel assistance are very local in nature, involving very personalized attention (including outreach). Rather than performing extensive promotion of the availability of these funds, the institutions which administer the funds recognize that given the limited availability of resources, they best serve themselves and their constituency by avoiding wide-spread publicity. The lack of knowledge, in other words, does not represent a breakdown in the system.

There should be concern, however, about the lack of knowledge of private sources of dollars in light of actual and potential LIHEAP funding cutbacks. Given the possibility that private funding (including private distribution of funds) will become critical in the absence of LIHEAP, the fact that the low-income population is not socialized to look for these private sources represents a potential problem. Moreover, it is not clear that the private sources of funding have the ability to administer an appropriate outreach campaign should the need for their services become more acute. While there is a network of private funding available to supplement LIHEAP at present in Colorado, the ability of this network to take on extensive additional responsibilities is not clear.

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For ease of presentation, all Appendices but Appendix F have been deleted from this document. The reader wishing to obtain these tables may contact the author directly.

APPENDIX F: PROBLEMS WITH USING THE POVERTY LEVEL TO DEFINE WHO IS POOR

Of the various standards that have been developed to define what poverty is, and to determine who the poor are, the one most frequently cited is the federal Poverty Level. The Poverty Level (or some multiple of it) is used as an eligibility marker or point of reference by most state and federal agencies to determine income eligibility for public benefits programs. The substantial weight placed on the Poverty Level as an eligibility standard makes the history of its development of some interest.

Whatever its initial legitimacy, the federal Poverty Level is no longer an adequate mechanism to define who is "poor" in Colorado.

The formula for determining the federal Poverty Level was developed in 1960 based on the assumption that families spend one-third of their incomes on food.¹⁷⁰ In 1969 the basic procedure was changed, and thereafter the previous year's figure was simply increased by the amount of the CPI without further reference to the 3:1 formula.¹⁷¹ The operative logic of the Poverty Level, however, is *still* that total non-food expenses bear a constant relationship to food costs of two-thirds (non-food) to one-third (food).

Set against this, however, is the relative decline in food as the driving component of the low-income budget. In the years since 1960, non-food living expenses such as housing, medical and utility costs have risen at a rate far greater than food costs.¹⁷²

In addition, the standard used to determine the cost of food has been subject to criticism from the beginning. The federal government used as its standard USDA's "Economy Food Plan." This plan represents the minimum amount of money needed for subsistence on a temporary or emergency basis when funds are low.¹⁷³ By contrast, the U.S. Department of Agriculture has also defined a "Low Cost Food Plan" which the Department defines in terms of the minimum amount of money needed to provide a nutritionally adequate diet on a consistent basis.¹⁷⁴ Since the Poverty Level represents annual income, it would be more sensible to base the Poverty Level on the USDA's Low Cost Food Plan which provides adequate nutrition, rather than on a plan which is *not* nutritionally adequate and is designed to be used on a temporary emergency basis only.

170. See, Committee on Ways and Means, *Overview of Entitlement Programs: 1991 Green Book*, at 1132ff (May 1991); see also, Women for Economic Justice, *Beyond Growth, The Underside of the Economic Miracle in Massachusetts*, at 1 (1987).

171. Committee on Ways and Means, *Overview of Entitlement Programs: 1991 Green Book*, at 1133 (May 1991).

172. *Id.*

173. U.S. Department of Labor, Bureau of Labor Statistic, *Three Standards of Living for an Urban Family of Four Persons*, at 9, Bulletin No. 1570-5 (1969).

174. *Id.*

The recognition that the Poverty Level does not provide an adequate standard for determining who *is* poor and who is *not* poor is evident in the income eligibility criteria set forth by both state and federal agencies for means-tested public benefits programs. Agencies seeking to set income eligibility limits for benefits often use either some multiple of the Poverty Level, or some other standard entirely. In fact, programs such as Women, Infants, and Children (WIC) have income levels that allow eligibility for people who are up to 185 percent of the Poverty Level.