

**How Families View and Use the EITC:
Advance payment versus lump sum delivery¹**

Jennifer L. Romich
Northwestern University
romich@nwu.edu

Thomas Weisner
UCLA

Submitted to the National Tax Journal
November 15, 1999
Revised January, 2000

***Abstract** - We analyze ethnographic data on 42 families' perceptions and uses of the EITC, including the decision to use the lump sum or advance payment form. A behavioral life cycle (BLC) model lends a theoretical framework and a description of family financial situations provides context. Parents discuss and exhibit a strong preference for a lump sum combined tax refund and EITC over the credit's advance payment option. We argue that the preference aligns with the BLC model and is rational given scarce time, money and personal energy. We conclude with implications and hypotheses for quantitative investigation of labor supply and well being issues.*

INTRODUCTION

In 1990 and again in 1993, Congress approved significant expansions of the previously modest earned income tax credit (EITC). These increases targeted working families with children. In a 1993 event publicizing the administration's role in the increases, President Clinton lauded the expansions and celebrated this policy that made work its primary goal, "[The EITC is] not about more governmental or social workers, or more services. It's about more groceries and a car, more school clothes for the kids and more encouragement and hope to keep doing the right thing" (1998).

Analysis of the policy's effectiveness must examine the extent to which these hopes are being realized. As the EITC gains prominence in the national budget and policy debate, researchers are starting to investigate the credit's policy effects and possibilities. A picture of the credit's impact on labor supply and well being is emerging. Most significantly, the EITC accounts for the largest share of the increase in single mother's formal work participation over the past two decades (Meyer and Rosenbaum, 1998). The credit also seems to have caused a slight decrease in labor force participation by secondary wage earners while having no empirically discernable impact on marriage decisions (Eissa and Hoynes, 1998; Ellwood, this volume). Furthermore, the credit lifts more families with children out of poverty than any other government transfer program (Council of Economic Advisers, 1998; Blank, 1999; Greenstein and Shapiro, 1998).

Creating a link between the EITC and well being also requires an examination of how families spend the credit. Are low-income families purchasing the projected groceries, cars and school clothes? There is also a puzzle about *when* families choose to spend the credit. The vast majority of families receive it in the form of a lump sum after the end of the tax year, even though they could get the bulk of their credit advanced in increments over the course of the year (GAO, 1992). These concerns motivate the questions we examine.

- What are the thoughts and decisions of low-income families when filing their taxes?
- If they receive a check, how do people allocate it between consumption and savings? What do they buy?
- How, if at all, does information about tax refunds and credits influence planning, work participation and consumption at other times during the year?

Understanding the decisions people make to use (or, more commonly not use) the advance payment requires examining tax time within the context of year-round spending, savings and work decisions.

In this paper we draw on intensive qualitative data to provide a detailed description of how families view and use the EITC. We spoke with urban low-income families in Wisconsin, a state with a large state earned income credit. Qualitative

empirical work on EITC recipients is relatively rare and this is the first work we know of since the credit's expansion in the mid-1990s. See Olson and Davis (1994) for an earlier interview-based investigation of knowledge of the credit and advance. We rely on theories of household consumption behavior to frame the lump sum versus advance form trade-off and conclude that an augmented form of basic life-cycle consumption hypothesis best predicts the observed behavior. We hope this present work complements other work on the EITC and sparks quantitative investigations of our findings (e.g. see Barrow and McGranahan, this volume).

BACKGROUND

We assume that readers are familiar with the federal EITC. To understand the specific circumstances of our Milwaukee sample and issues involved in the trade-off between lump sum versus advance delivery, we provide background information on the Wisconsin credit as well as the federal and state advance payment options.

Wisconsin is one of several states which offers an EITC. Like most state EITCs, Wisconsin's is based on the federal qualifying restrictions. The Wisconsin EITC is only available to families with children and is prorated by number of children. Families with one qualifying child receive a credit equivalent to 4 percent of their federal amount; two qualifying children increases the credit to 14 percent. The federal credit is capped at two children, but the Wisconsin benefit is most generous for families with three or more qualifying children. Such families receive a refundable credit equal to 43 percent of their federal amount. A family with three children and earnings in the maximum credit range, will receive a \$1600 Wisconsin credit and a total of over \$5000 from state and federal EITCs combined (Wisconsin Department of Revenue, 1998A).

In 1979 the federal government initiated an advance payment option through which workers can receive a portion of their projected EITC credit in every paycheck. Only workers with children are eligible. The amount advanced is based on projected income and cannot exceed 60 percent of the projected total credit for a one-child family. This cap applies to families of any size, essentially limiting families with two or more children to a hybrid advance payment/lump sum payment structure. In 1999, eligible workers could earn up to \$1387 with their paychecks (Internal Revenue Service, 1999a, b).

Receiving an advance credit involves coordination with an employer. The employee files a Form W-5, the Earned Income Credit Advance Payment Certificate with the employer. The employer then includes the credit in each paycheck. The total advance received is then reported on the employee's year-end W-2. All who use the advance payment then are required to file a tax return (Green Book, 1998).

Wisconsin offers an option, the Working Family Tax Credit (WFTC), that allows working members of families to benefit from the credit in advance of year-end filing. By completing form WT-4B and registering it with the employer, workers who qualify for the WFTC can be exempted from all state income tax withholding. This option serves as an advance equivalent to the non-refundable portion of the credit. Families who qualify for credit beyond the value of the exempted income tax then file for the additional amount (Wisconsin Department of Revenue, 1998B).

There is some concern over whether the federal advance payment form is underutilized. Over 98 percent of families receive all of the credit as a lump sum along

with their income tax refund (McCubbin, this volume). In the 1993 Omnibus Budget Reconciliation Act, Congressional attention focused on the low use of the advance. A report commissioned by Congress recommended increasing public awareness of the advance option. This call has been echoed by not-for-profit organizations (General Accounting Office, 1992; Center on Budget and Policy Priorities, 1998). The decision whether or not to claim the advance credit makes a difference in household income flow. For an earner with two children who earned \$15,000 in 1998, the decision to receive the EITC in one lump sum of \$3174 rather than \$115 advanced per month with the balance of \$1794 at tax time means forgoing a nine percent increase in monthly income. Whether the smoother income pattern enabled by the advance credit option raises family utility is a question of theoretical concern. We turn to that now.

Household Consumption Theory

Discussions of optimal spending often implicitly invoke a life cycle model of savings. Is that the most appropriate conceptualization? Theoretical explanations of households' consumption uses of the EITC must account for two choices.

1. Which delivery mechanism gives greater utility, the advance payment option or the lump sum?
2. What kinds of purchases will be made with the respective payment forms?

We outline predictions using life cycle theory and then a modified life-cycle model that incorporates psychological aspects of savings.

The life-cycle hypothesis of savings and consumption provides a useful starting point for understanding the relationship between a household's income, current consumption, and savings². This theory holds that current consumption is a function of the present value of projected lifetime earnings. Anticipated future income will be factored into current consumption decisions. Under common assumptions, an increase in future income will raise both current and future consumption.

In the life cycle hypothesis, a worker who knows she will get a large tax credit will consume with that credit in mind. In the most simple view, timing of income is neutral. A \$120 payment today is equal to \$120 in twelve months time or \$10 per month for a year. Life cycle theory is often augmented to reflect credit constraints and future discounting (Thaler and Shefrin, 1981). With the plausible assumption that a low-income family faces high interest rates for borrowing or credit constraints, timing is no longer neutral³. Now a monthly payment is superior to the year-end lump sum. Further, economists often assume that people are impatient and would prefer money now to money in the future, all other things equal. With slight and sensible modifications, the life cycle hypothesis makes a prescriptive statement about timing of payment: the advance form of the EITC is superior to the year-end lump sum.

There can be situations where the life cycle hypothesis holds for households, yet they still do not use the advance payment. For instance, persons who do not know about the advance will not claim it. Attempts to claim might also be stymied by an employer who does not know about the credit or actively discourages workers from taking advantage of it. See General Accounting Office (1992) or Smeeding et al (this volume) for an additional discussion of employer-level explanations of low uptake rates of the advance payment option. In all these situations, using the advance payment would raise the family's utility, as theory predicts, but is not feasible due to other constraints.

A second explanation for the low reported use rates is that the life cycle theory does not adequately predict household behavior. Citing the life cycle theory's mixed empirical success in a number of different areas, Thaler and Shefrin (1981) propose an augmented version of the hypothesis that incorporates psychological concerns, the behavioral life cycle model.

The behavioral life cycle model incorporates three aspects of human behavior: self-control, mental accounting and framing. In this model, self-control has a cost and persons are willing to pay a price to not have to exercise self-control⁴. Consumers act as if they have separate funds within their accounting system by separating income into current income and wealth. Finally, the marginal propensity to consume from different income sources (ex: salary versus bonus) varies, even if the action that resulted in the income (work) is the same. People are more likely to build assets or savings with money they view, or "frame", as wealth, relative to money they view as current income. An emerging collection of theoretical and empirical work builds on this model (see, for example, Zimmerman, Eason and Gowan, 1999; O'Donoghue and Rabin, 1999; Souleles, 1999) particularly in the area of saving for retirement (Bernheim, Skinner and Weinberg, 1997; Lusardi, 1999; Levin, 1998,).

In the case of the EITC, the behavioral life cycle model has different predictions and prescriptions concerning the decision of when and how the credit will be spent. The theory is no longer neutral with respect to timing and form. The cost of self-control suggests that persons might prefer the lump sum payment over the advance form, particularly if they have lumpy consumption needs. Mental accounting and framing suggests that a lump sum will be seen as different from additional income received in a paycheck. Specifically, the marginal propensity to save from a lump sum payment is greater. Unlike the life cycle model, the behavioral life cycle hypothesis does not suggest that the advance form of the credit necessarily enables a household to reach greater utility.

Examining these predictions requires data on household income and consumption streams. In this study we draw on ethnographic data to provide a detailed description of low-income families spending over time. Our design precludes explicit hypothesis testing and cannot reject one theory in favor of another. Rather, we aim to richly describe and analyze household behavior around the EITC. In doing so we raise questions about household consumption theory.

DATA

The ethnographic data used in this analysis comes from a much larger study integrating multiple research perspectives and methods. For context we briefly describe the larger study. Our sample is a subset of 1357 households who volunteered for the New Hope Project, a community-initiated anti-poverty program in Milwaukee, Wisconsin. New Hope enrollees faced a random assignment and agreed to participate in a program evaluation run by the Manpower Development and Research Corporation (MDRC). Additionally, 812 households with young children were identified to be part of a more in-depth child and family study. Project data used for descriptive purposes in this paper comes from New Hope intake forms and survey administered after the first two years of the program. We also use administrative data from the Unemployment Insurance (UI) administration, the federal Internal Revenue Service, and the Wisconsin

Department of Revenue. Interested readers may consult Brock et al (1997) and Bos et al (1999) for additional information on the New Hope program and study.

Ethnographic sample

A sub-set of 60 families was randomly drawn from the families with young children and assigned to fieldworkers.⁵ A Spanish-speaking fieldworker is assigned to families where Spanish is spoken as the primary language in the home. Families who agree to take part are paid \$50 per quarter they remain in contact and participate in interviews and field visits.

Of the families contacted 77% (46 of 60) were located and agreed to participate. Some families had moved from Milwaukee (e.g. to California, North Carolina, etc.) and so they could not be included in the ethnographic study. Excluding cases outside of the Milwaukee-Chicago metropolitan areas, the ethnographic sample includes 87% of those families contacted. An additional four families were excluded from this analysis because fieldworkers had completed fewer than three visits with them as of April 15, 1999. This leaves 42 households for the purposes of this descriptive analysis.

Demographics of our sample are presented in Table 1. When applicable we compare our sample to the comprehensive national distribution of all 1994 EITC recipients as described by the General Accounting Office (1996). Although the GAO work pre-dates our study, this comparison with publicly available data illustrates that our sample is policy-relevant subgroup of possible EITC recipients rather than a nationally representative group. Overall our sample seems to be more persistently economically disadvantaged than an average federal EITC recipient, likely reflecting the persistent poverty which characterizes the particular Milwaukee neighborhoods targeted by the project.

[Table 1]

In most cases the primary respondent is a woman. Four-fifths are between 25 and 45 years old, with the average age at the two-year follow-up being slightly over 32. About half are African-American. One third of the ethnographic sample is Hispanic, a category which contains a diverse mixture of Puerto Ricans, Mexican-Americans, and immigrants from other Latin American countries.

Family structure, particularly number of children, is an important indicator of the amount of EITC credit a family receives. Most families in our survey had more than one child. Most have two or more and about half have three or more children, hence qualifying for the maximum level Wisconsin EITC credit. About one eighth are married and living with a spouse; slightly fewer report living with a partner. A significant number also live in households with other adult relatives. Our sample seems to be less likely to be married than the nationally average EITC recipients; GAO work reports that one third of 1994 recipients filed as “married.”

Labor market statistics are reported in Table 2. Between signing up for New Hope and the two-year follow up survey, 92.9 percent of respondents worked in a job where earnings were reported to the Unemployment Insurance administration. Among those who worked, average earnings were between \$8000 and \$9000 per year, which places them within the phase-in or early plateau portion of the credit for families with

children. They also reported working over 1400 hours per year on average. The respondent's earnings were not the only source of income for these families. Many households had other wage earners or received transfer payments such as W-2 (Wisconsin Works, the Wisconsin TANF program) or SSI. The last line of Table 2 reports that on average less than two-thirds of a sample member's household income comes from earnings. This partial reliance on transfer income further illustrates economic disadvantage.

[Table 2]

ETHNOGRAPHIC ANALYSIS

This analysis uses ethnographic data. We have data on the way of life of economically poor families and children in the program and control groups, situated in their neighborhoods and work settings. In this section we describe how our data is collected and analyzed.

Several techniques are used to gather data. Fieldworkers undertake focused, semi-structured interviews and participant observation in homes and community settings. Interviews are focused on work, childcare, budgets and incomes, health care, social supports, family history, children's schooling, and a common list of related topics.

Fieldworkers also prepare questions on specific topics that are circulated to other fieldworkers, answered by fieldworkers following visits with their families, and posted on the web site. This was the approach used to gather information on EITC and related family budget data. Common topics and questions regarding EITC, budgets, and related topics were explained to the group of fieldworkers and preliminary findings were discussed during meetings. Abridged versions of both the general fieldwork template and the EITC questions as presented to fieldworkers are included in the Appendix.

The product of all these field visits are field notes, which are organized according to the common topics and then used in analysis. Analysis of qualitative data is an iterative process. We start with reading through the complete field notes to identify themes and patterns. Notes are then coded and tallied according to these preliminary findings. Narrative summaries including all relevant information are written for each case. Summaries were double-checked by a research assistant and by each case's fieldworker. New hypotheses emerge in the course of analysis, prompting notes to be re-coded and summaries revised.

Study limitations

In this section we discuss some of the trade-offs that apply to our particular data set—both the sample and the methodology.

Our sample is drawn from one geographic area. This is not a nationally representative sample and can not be generalized as such. However it is a strong sample for addressing questions concerning the EITC and low-income families. The sample is drawn from Milwaukee, a unique and interesting site for research on income tax credits and workers at the lower end of the earnings distribution. Due to the relatively generous state earned income credit, Wisconsin residents are eligible for a larger total EITC than persons from other states. Wisconsin was also among the first set of states to receive a

waiver for reform of the AFDC system and started its state-wide reform two years before Congress passed the Personal Responsibility and Work Opportunity Reconciliation Act.

It should also be noted that the sample consists largely of low-income persons who voluntarily signed up for a work-based program. We believe that the volunteer nature of the program does not corrupt our sample and is actually a benefit for analyzing EITC knowledge and use. Demographically New Hope participants were relatively similar to the general population of the targeted neighborhoods (Brock, et al 1997). Within the volunteer sample the individual participant families were selected using randomization. This is different from some ethnographic work that relies on word-of-mouth and participant referrals to build a sample. Finally, our sample consists the types of families targeted by the EITC (low-income and able to work) while having been selected without pretesting for any prior knowledge or use of the EITC.

The use of ethnographic data separates this analysis from most other work on the EITC. Strengths of our ethnographic data lie in the longitudinal and personal nature. We follow families over time, both hearing plans and observing behavior. Collecting data in the form of an on-going relationship where one fieldworker visits a family every four to eight weeks also encourages honest responses on touchy subjects such as non-compliance and purposeful mis-reporting. However fieldworkers do not ask the exact same questions of every family. Due to idiosyncrasies of individual households, the depth and thoroughness of data on any given topic varies. Our goal in presenting data from intensive qualitative work with a small number of households is to provide a complement to other types of analysis.

FINDINGS: FAMILY FINANCES AND TAX TIME

In this section and the next we present findings on how people view and use the EITC. First we overview some families' financial situations—both generally and as they relate to tax time. Then we will analyze several findings that suggest Thaler and Shefrin's (1981) behavioral life cycle theory accurately describes the choices surrounding the use of the lump sum EITC.

Household finances

Thoughts and decisions surrounding taxes and credits are one element in a family's total financial picture. Overall our data shows that making ends meet is a difficult and time-consuming task for low-income families. This is congruent with the findings of Edin and Lein (1997), who interviewed over 350 low-income single welfare-reliant and working women in the late 1980s and early 1990s. This study documented the careful accounting that goes into managing a low-income household. Mothers know the sources of their income and where all of it goes. Although our sample includes married households and allows for slightly higher household income, the same financial acumen is present.

Like the wage-dependent women in Edin and Lein's sample, the working mothers and fathers in our sample have many conflicting demands on their time and money. Problems that all working parents face—arranging day care, finding time to spend with children, completing housework—are worsened by reliance on public or undependable private transportation, working evening and weekend shifts, and neighborhoods lacking reasonably-priced shopping and medical services.

Although most support themselves primarily through work, few have predictable work lives. Most primary contacts have held several jobs over the past two years. Only eight (19 percent) have worked at the same job over the duration of our contact with the family. Additionally, over a quarter (11 respondents) has held formal or informal second jobs at some point.

Income varies but bills remain a constant. Seventeen families (40 percent) have debts other than mortgages. Among families with whom we have discussed outstanding debt, one third owe over \$400. Estimated total debt ranges from \$200 to \$10,000, with the median between \$1000 and \$3000. This includes car, credit card and furniture payments that families make as well as bills families are not currently paying. Back utility bills are the most common forms of outstanding debt, followed by medical bills.

Money-related stress varies among families. Many, 40 percent, feel comfortable with their financial situation. Respondents from these families often cite their ability to budget limited money. One woman describes herself as a “penny pincher” another says that she would rather cut back than go into debt. A significant number—24 percent—feel the opposite, bills are constantly overwhelming them. Parents say they “can’t get ahead” or are constantly short on money. Finally, the remaining 36 percent fall somewhere in the middle—generally surviving, but always close to financial problems. Field notes describe one woman who commented, “as long as things were going okay, then [I] could make it.” Another woman feels stressed by bills and the costs of helping a sick relative, yet says, “I believe it will work out... It’s tight now but we got a roof over our head, we got food. You know we don’t have a lot of little splurging or anything.”

It is this financial background—less-than-stable work and constant budgeting with various degrees of success—against which families decide how to receive and use the EITC. How does the credit fit into these families’ budgets? Next we turn to how families view tax time generally and what they know about the EITC.

Tax time

Not all families in our sample were eligible for the EITC. Two held two jobs and clearly earned too much; several others were close to the total phase-out limit of the credit. Two are wholly self-employed in cash businesses and do not file taxes⁶. Another four have no earned income; three rely on welfare and one receives SSI disability payments. This leaves 34 of the 42 (81 percent) potentially eligible for the credit. This is higher than the administrative estimate of actual percentage of recipients reported in Table 3 suggest.⁷

[Table 3]

Not all of these working families get their income taxes refunded. Six households (14 percent) had their tax refunds and EITC garnished automatically in one or both years due to outstanding debts incurred in government-administered programs. Three participants report owing back student loans, the most common reason for garnishment. The others have their refunds garnished for back taxes, overpayment of Unemployment Insurance, or convictions for welfare fraud.

People use a variety of tax preparation methods. Among respondents who discussed how they prepared their tax forms, ten percent completed the forms themselves, 60 percent used commercial services, 15 percent relied on non-profit community agencies or the free tax assistance offered by the government, and another 15 percent relied on a

friend or relative. Informal preparers—relatives and acquaintances—frequently charged a small sum, \$15 or \$20. Most who used commercial services did so because they could get the money more quickly. As noted by Olson and Davis (1994), participants use terms featured in commercial tax preparation firms' advertising, most notably H&R Block's "rapid refund."

Among those persons who file, most think about tax time far before W-2 forms arrive. Sample members generally look forward to their tax check, often planning in advance what they will do with the money. Tax time is an exciting time of year for most of the low-income working families in our sample. As one sample member exclaimed, "I tell people, 'I can't wait for January' and when they ask why, I tell them its so I can file my taxes." Generally, people view tax time as a time when they can get caught up on their bills and feel a little ahead for a while. Field notes describe the thoughts of one woman, who is counting on a \$4000 combined refund and credit,

She can pay off all her [back] bills, be caught up with all her bills and not feel stressed... all she has to do us keep working until December. Then in January she can turn in her tax form so she can get that money

Up to this point, we have lumped tax money together with the EITC. This reflects the views of our sample members. The delivery mechanism that links the EITC with the income tax system is reflected in people's views of the credit.

EITC awareness

Most people have heard of the EITC. In 1997, only three respondents (eight percent of filers) had never heard of the EITC. By 1998 only two sample members were unaware of the credit. Without tax records, we have no way of knowing whether or not these families claim the EITC, although the dollar amounts of their combined federal and state tax checks (\$2900 and \$4000) suggest that they received the credit. An additional one fifth of the sample member recognize the EITC with slight prompting. Participants often note that they heard about the credit through New Hope (if they were in the New Hope sample group), another community agency, family members or friends.

Most families (53 percent of 1998 filers) are aware of the credit, but cannot give an exact break-down of how much they get from the EITC versus how much comes from their refund. Field notes describe a typical response from October, 1998,

Although [she] could not recall if the money she got at tax time was EITC money or not, she does recall how much she got and what she has done with it. Last year [she] said she got about \$4000.

Finally, about ten percent recognize that part of their tax check comes from the EITC program and can give a dollar breakdown of the amounts. The explanation of this working mother with four children, is typical of this group—she educates a fieldworker (notes translated from Spanish),

[She] knows pretty well what [the] EITC is, she showed me her tax forms and explained to me what [the] EITC was. According to the tax form that she showed me, last year she got \$1350 thanks to the EITC. In the end she got almost \$3,000 refunded from her income taxes.

Knowledge of the EITC is widespread.

Marginal incentives

How sophisticated is this understanding? The EITC credit structure decreases the rate of supplement as families move beyond the upper end of the plateau into the phase-out structure. Economists' concerns about the work disincentives on the phase-out portion of the credit is not reflected in the descriptions most of our families give of the relationship between how much they work and how much credit they get. With an average income of less than \$9000, most of the families in our sample are in or below the plateau area. This limited experience drives their understanding of the credit.

Overall, people commonly describe a linear relationship between the amount they work and the total amount of their check. Among participants who discussed the relationship between the amount they work and the amount of the check, one third of the cases could be described as holding a "more work, more money" view—accurate for those in the phase-in part of the credit. One woman describes her thoughts on the issue to a fieldworker,

[She] said that sometimes when she thinks about whether she is going to work over-time, she does think that if she works more her tax check will be bigger, but that thought really doesn't sway her to work too much more.

The perception of marginal incentives may be related to work experience. Recent welfare reforms and a very strong labor market in Milwaukee have drawn many of our sample members into full time work over the past few years. Some of the respondents who think their combined refund and EITC will increase with increases in work have entered the workforce over the last two years. Consider one mother of four children, who moved off welfare into a relatively well paying office job in the fall of 1997,

Once she had done her taxes [for 1997] and figured out how large her return would be, she realized that it was only for four months' worth of work, 'Four months! I was wondering why I didn't have a job the entire time!' She got a very big tax return - \$4000, \$2000 of which she thinks was the EITC. [She] estimates she will get about \$6000 this year.⁸

Likely she is over-estimating, but not drastically. The perception that more work will continue to increase the check at tax time does not reflect the phase-out structure of the EITC but is consistent with over-withholding. For such families who are new to the workforce, it will be interesting to observe the yearly learning process and its implications for labor supply as we follow them over two more years.

Only two families in our sample know they need to earn a certain amount in order to maximize their credit. One family, with two parents in their late 30s and five children, generally subsists on informal labor ("junking") but also aims to have about \$12,000 in reported earnings. Field notes from the other respondent, a single mother with two children and five years of heavy employment (often working two jobs), illustrate her understanding of the credit. The fieldworker asked if the EITC makes her work more.

No, she explains that she actually tries not to work too much. One year a few years ago she was working a lot the whole year and ended up actually owing money. I ask how much work is too much. She doesn't give a specific amount but does tell me that it depends on family size. She keeps her hours down because, "I work hard for my money and I want all of it."

These families with long work histories describe a decreased labor supply in response to the phase-out of the credit.

Misunderstandings and strategic use

In addition to a general understanding of implicit marginal tax rates based solely on previous experience, there are a few families at both ends of the knowledge distribution—those misinformed and those highly informed.

Three members of the sample misunderstood the eligibility rules surrounding the credit. One person, the only working adult in her household, makes \$6.25 an hour yet thinks she earns too much for the credit. Another believed she had to be unemployed part of the year to qualify. Another mother thought that she was ineligible because she did not work an average of 25 hours per week.

In contrast, some families understand the marginal incentives offered by the EITC and income tax structure thoroughly enough to engage in strategic behavior beyond adjusting labor supply. Three families plan their tax filing status to maximize total refunds. In extended families where multiple adults share child-raising responsibilities, different people may file returns identifying different children as dependents. For example, one woman relies on her mother to baby-sit her younger daughter every weekend. The grandmother also buys school clothes for the child. In return for this care, the grandmother “gets hers back at the end of the year” by (illegally) filing the child as her dependent and receiving an EITC.

Use of advance

Consistent with general perceptions and the GAO report (1992), most of the families in our sample receive their credit in a lump sum. Four of the taxpayers chose the advance payment option in 1997; three continued to claim the advance in 1998. One woman claims the advance as a way of preventing her EITC from being garnished for outstanding welfare overpayments. Another works for a community not-for-profit agency and was encouraged to take “W-5 plan” at work. The woman who discontinued taking the advance ended up owing money in 1997 and switching employers at the end of the year. She did not file a W-5 with the new employer. One additional sample member who had received the advance at a previous job was told the option was not available with her current employer.

Among the sample members who do not claim the advance, most do not know much about the option. When asked generally about the EITC, six mentioned that they got the credit in a lump or do not take the advance. Others did not volunteer knowledge about the advance payment option. In the cases of some families that received the lump sum and did not seem to know about the advance, fieldworkers told them about the option. Most continued to express preference for the lump sum—generally saying they wanted to get all their money at once. Upon learning of the advance option, no one said they would prefer it to the lump sum. These findings are consistent with the more systematic analysis presented in Olson and Davis (1994).

This description of families’ generally stressed financial state, awareness of the EITC and eagerness to get a tax check makes the preference for the lump sum delivery over the advance form seemingly more puzzling. If some families are constantly struggling to make ends meet and most know that the EITC is a helpful source of income,

why do so few choose the advance option? Wouldn't the advance option increase families' well being?

FINDINGS: BEHAVIORAL LIFE CYCLE HYPOTHESIS

In this section we examine several pieces of evidence that support the use of the behavioral life cycle hypothesis as an explanation for household behavior. Like Thaler and Shefrin (1981), we find that a need for self-control drives spending and saving patterns. We find support for Thaler and Shefrin's assertion that people keep money in separate mental accounts. Then we argue against the assumption that people do not use the advance merely because they do not know about it. Next we show that uses of the lump sum credit are consistent with the predictions of the behavioral life cycle theory. Finally, we argue that delivery of the EITC through a lump sum actually serves to maximize some families' utility.

Self control

Some families in our sample express difficulty with exercising self-control in spending. Among families with whom we have discussed or observed budget decisions, over half (58 percent) have trouble budgeting money. One woman wishes she could set money aside, but says, "The majority of money when I do get paid is going to bills." Savings accounts get whittled down easily. This leads to different coping mechanisms. From field notes,

[She] had to take money out of the bank that she had been trying to save, "not to get things that I want, but to get things that I need. It's like uh! Sometimes you can't win for losing." She explained that she purposely opened a bank account far away so she wouldn't take her money out so often.

Another mother tried to work out a payment plan with her daycare that meshed with her pay schedule,

She said that she has tried to make an arrangement in which she pays a lump sum every two weeks when she gets her check, because if she waits she won't have any money left on the week she doesn't get paid.

In light of strained resources, persons in our sample choose to use self-control mechanisms.

Mental accounts: "tax time" and the EITC

Applying Thaler and Shefrin's (1981) behavioral adaptations to life cycle consumption theory results in distinct predictions about how people view and use the EITC. In their theory, households act as if they explicitly divide money into mental accounts. Separating money this way allows for greater self-control over part of the money seen as wealth.

Earlier we described how people view tax time as a unique season of the year—where they can momentarily catch up or even get ahead. Similarly, they talk about the money from taxes in different terms than they use to describe paycheck money. Often people will discuss tax time in a ritualistic manner, "I always buy furniture with my tax money." Or "when I get my check I buy a car." People will splurge during tax time in ways they would not normally. One family goes out to dinner a few times, "to all the places they could never normally afford."

Consistent with the behavioral life cycle assertion of mental accounts, people see tax money as different from periodic income. However, they do not generally distinguish the EITC from the rest of their refund. This lack of a distinction between the two sources raises a question about the relation between knowledge and the use of the lump sum. Are people not using the advance because they do not know about it? Recall that this would be consistent with the low reported use rate and the life cycle hypothesis.

Information and use

There are two possible interpretations of the relationship between not knowing about and not claiming the advance credit form. A common argument, consistent with the life-cycle hypothesis, is that people do not claim the credit because they don't know about it. With sufficient information and education, people would claim and benefit from the advance. Along these lines, Olson and Davis (1994) argue for increased education about the advance option.

While we agree that increased education will do no harm and may very well inform people who could benefit from the program, we argue for a second interpretation of the lack of information. People do not know about the advance payment option because it is not useful knowledge.

It is interesting to compare knowledge of the advance with knowledge of another tax-based benefit available to the members of our sample. The Wisconsin State Homestead Credit provides a tax credit for low-income households with earned income who own or rent homes or apartments. This credit was not originally a topic in the ethnographic template; hence fieldworkers did not ask about it. However, respondents mentioned the Homestead Credit voluntarily when talking about taxes. Field notes from an early visit show one woman educating a field worker. The fieldworker's comment is italicized.

L_____ is looking into something called the Homestead program (which I had never heard of, so if this sounds fuzzy, it is probably due to my lack of understanding; L_____ seemed to have a pretty good grasp of what it was). This is a program that is offered to low income families ...whereby they will pay you back for up to half of your rent. You don't qualify if you are getting subsidized housing. L_____ thought that for example, you were paying \$500 a month, that the homestead program would pay you up to \$250 .

This participant's understanding is basically correct for her family income. In 1999, a family with two children and an annual income of \$15000 who pays \$500 per month for a heated apartment would qualify for \$290 from the Homestead Credit (author calculations using Wisconsin Department of Revenue, 1998C). Other sample members displayed similar knowledge of this credit. This included familiarity of the process needed to claim the Credit—namely saving rent receipts and having a landlord fill out a rent certificate to attach to the state income tax. Widespread knowledge of the Homestead Credit—a program with clear financial benefits—contrasts with the scant knowledge of the EITC advance payment option.

The life-cycle hypothesis would hold if information had no cost. That is not true—people have limited time to pass on and absorb information. The most useful information gets passed on first and people may not pass on useless information. This suggests a different interpretation of the lack of knowledge of the advance. The absence

of information on the advance credit delivery form arguably demonstrates that the option does not represent a valuable benefit for low-income working families. To understand why the advance might not be a benefit we turn to the marginal consumption patterns enabled by the credit.

Post-check consumption

Not only does the behavioral life cycle theory suggest that people think about tax money differently than they think about paycheck income, it predicts that they will spend it on different things. Following the prediction of Thaler and Shefrin (1981), people will likely spend current income on current consumption and wealth (lump sum) income will be saved or spent on larger-ticket goods.

Again, this violates the life cycle hypothesis of fungibility. A life-cycle hypothesis suggests that income is neutral with respect to source. Thaler (1994) has contradicted this in a study of employee compensation, showing that marginal propensity to save from bonuses—even expected bonuses—is greater than the propensity to save from paycheck earnings. We should expect more savings and larger-ticket purchases from the EITC money than from normal income.

We find that families' plans for and uses of tax checks generally parallel the findings of Smeeding et al (this volume). We concentrate our discussion on two aspects of family well being—expenditures on children and asset accumulation. The former confirms the policy intention that the program benefit children. The latter shows support for the behavioral life cycle hypothesis.

Two-thirds of the parents in our ethnographic sample who receive the EITC or a substantial tax refund cite expenditures on children as a priority use of check. Among the eight families who did not specifically mention buying items for children, four were using the check as a lump sum down payment on a house or car (two instances each). Clothes are the most commonly cited child-specific purchase. The mother of a preschool-age child and a kindergarten-age child explains,

when my taxes come... then I'll take the kids shopping because my kids really need to go shopping, especially [my older son]. He has no clothes. He needs clothes... I can't send my son to school like this. I need to shopping for him really bad. Once I get the money, you know send in all the papers - my W2 thing, I [am] most definitely going shopping for my son. Go to Wal-Mart and Kmart and just stock up.

The lump sum payment enabled purchase of a child's wardrobe—a full set of socks, underwear and school uniforms—rather than a few items at a time.

Other child-specific uses of the credit are to pay private school tuition (three instances) and establish savings accounts in a child's name (two instances). People also take joy in being able to give their kids money to spend or take the family out for a special treat—some of the credit is used for “fun money” or to “fool with.” Most child-oriented expenditures are non-durable consumption, but durable good purchases actually are a more visible part of post-check consumption.

Whenever during a year taxes are discussed, family members can often point to some item in their lives purchased after last tax time—furniture, a car, appliances or a house. Furniture is the most common post-tax check purchase. Among the families who received tax checks, 60 percent bought couches, tables, beds or other furniture.

Appliances are also another necessary asset. Inexpensive Milwaukee apartments generally rent without stoves, refrigerators, washers or dryers. The first two are crucial; the latter two are important time-savers for working families (Edin, 1998). Our respondents have used their tax checks to buy washers, dryers, refrigerators and a deep freeze. Entertainment equipment such as TVs, VCRs and videos are another popular purchase, 29 percent report such purchases.

Transportation and housing are the next two most common uses of the refund and credit check. Just over one quarter of our sample has used or plan to use their credit on a car. This includes buying cars outright, making a substantial down payment or repairing current cars. One person's only planned use of her refund is personal transportation, "I said I don't care what I get back as long as it's enough to get me a car... get me a car that can take me around for ... at least a year or two."

Nine members of our sample (21 percent) own a home, with three having explicitly said they used their tax refund/EITC for a down payment. Five more are house shopping in 1999, including two who plan to use their 1998 tax check as part of a down payment. These asset-building uses of the lump sum credit check are consistent with the behavioral life cycle theory.

Many families hope to save a portion of the tax check; some are able to. Among the 28 families who received a net positive EITC/refund and for whom we tracked their subsequent spending, 19 (68 percent) did not have cash savings left from their most recent check after two months. As one woman lamented, "With bills and seven kids, the money didn't last long enough. Now it's back to week-to-week." Three of these rapid spenders arguably used the money for savings-like purposes—one paid for a land contract on her house, another made a loan to a friend. The third, a woman from a close-knit extended family, gave money to family members as an insurance payment, knowing that they would help her if needed. Three others paid several months worth of rent in advance.

Nine families (32 percent) had money in the bank more than two months after receiving their checks. These families were split between having large savings goals—such as saving for a down payment on a house—and keeping the money in the bank for future emergencies. The nine includes four families who admit to generally having problem saving money.

Consistent with Thaler and Shefrin's (1981) prediction of a lower propensity toward current consumption with lump sum payments, we find that people use their EITC and tax refund checks to buy larger-item goods, accumulate assets and create savings.

Self control revisited: expanding the total resource pie

The use of the lump sum tax refund and EITC check as a self control mechanism to enable large-ticket purchases and savings follows the predictions of the behavioral life cycle model. Ethnographic data gives insight into a secondary, interesting, and less conventionally visible aspect of this phenomenon. Following a family over time helps us figure out how they do make ends meet in the eleven months a year when they do not get a large refund. Their coping mechanisms actually serve to expand the total resources available to the family.

We find both formal and informal labor supply increases to cover budget shortfalls or to cover special expenditures. People can and do choose to work more hours when they need extra money. One woman paid for holiday gifts this way,

[In] October and November [she] had extra time to spend at work. On certain days she worked 12 hours a day, but it wasn't so bad because her job keeps her active and it is not boring. The money she made was used for Christmas gifts.

A more subtle form of increased labor supply happens informally--the extra labor of tightening the belt when finances are very short. Often, pinching pennies is extra work. Fieldnotes describe how one woman dealt with an unexpected shortage,

[She] said that she had to go down to the food pantry to get food for the kids to eat for the week. ... She hadn't been to the food pantry in a long time, but she had no choice.

Other non-market strategies include cooking inexpensive meals at home (49.6 percent of the survey sample reported having “enough food, but not always the kinds of food we want to eat”), being more vigilant about collecting child support from non-custodial parents, borrowing from relatives, and being very frugal with utility usage. These non-market methods of providing parallel many of those documented by Edin and Lein (1997).

All of these techniques require extra labor—which is obvious when talking with women. Given the very low incomes, lack of benefits associated with most jobs, and high job turnover, struggling to make ends meet drives such informal work much of the year. In effect, the lump sum format of the EITC creates an informal, unseen labor incentive for nearly all of the year. A family's income constraint is expanded as people cope with short-falls that would be covered by the advance.

SUMMARY AND DISCUSSION

The extremely low-income members of our sample generally know about the EITC and other specific programs, yet they do not know much about or choose to use the advance credit. Evidence suggests that this is due to rational optimizing behavior that follows a behavioral life-cycle description of household income and consumption. People view the combined income tax/EITC check differently than they view paycheck income. In particular, they display a higher propensity to consume durable goods and make large purchases. Also in the short run, people will put EITC money into savings. Finally, the use of the EITC as a self-control mechanism actually serves to increase the total amount of consumption available to the families as they substitute market- and non-market labor during months when they do not receive credit payment.

The preference for the lump sum delivery is puzzling in the context of the life cycle model. Our study design is not a rigorous test of household consumption theories, but findings imply that many aspects of how families view and use the EITC align with the predictions of the behavioral life cycle theory. Recent empirical work has investigated similar discontinuities between household behavior and the life cycle model in the areas of consumption around the time of retirement (Bernheim, Skinner and Weinberg, 1997; Lusardi, 1999; Levin, 1998) and spending of tax refunds (Souleles, 1999). Although our study focuses on low-income families, it is important to note that the tenets

of the behavioral life cycle model apply at all income levels, as reflected in other current work.

This work suggests a lump sum EITC can help very low-income families manage larger purchases such as furniture, cars and homes, a finding congruent with that of Barrow and McGranahan (this volume) who looked at a more representative range of EITC-eligible families. It also seems that self-control in spending habits might be an important predictor of asset-accumulation. In the face of a universal program such as the EITC, any relationship between asset accumulation and choice of EITC delivery system is difficult to interpret. Households with lower perceived costs of self control might both choose the advance payment option and save on their own to purchase assets. There is no way to identify spending patterns related to delivery mechanism.

Current and possible future variation between state EITCs could allow more conclusive investigation of some of hypotheses suggested by this research. One currently testable hypothesis involves the savings level of low-income working families. If a large lump-sum refund and EITC is more likely to be saved than paycheck income, we would expect low income households in states with more progressive EITC and income tax packages to hold more assets and have larger savings accounts than families with the same net income in less-progressive states. Another testable hypothesis concerns the link between timing of the credit and labor supply. Do households cut back their work hours temporarily when they get their checks? Both these issues could be addressed with large, nationally-representative data sets.

If the EITC does indeed allow families to save and build assets, another link must be made between these behaviors and family well being. There has been some recent attention to asset accumulation as a way of promoting well being (Sherraden, 1991, Oliver, 1997, Edin, 1998, Canedy, 1998). However, further specification of how assets contribute to functioning and eventually well being is necessary to inform policy trade-offs. Are assets a better buffer for children in low-income families than more cash income on a monthly basis? What is the developmental trade-off between a more stressed-out parent during the year and a mattress to sleep on or a home in a safer neighborhood? Given that income is not timing-neutral for low-income families, steps to identify parameters for an optimal mixture of regular and lump sum income must include specification of how money translates into family welfare.

This work has also led us to consider how the advance credit option ought to be publicized. Should service agencies and advocacy groups encourage credit-earners to take the advance, as some have done? Based on this data, we argue that people should be made aware that the option is available, but not necessarily encouraged to use it. Better would be a frank discussion of possible pros and cons.

Finally, systematic investigation of the role played by employers and for-profit tax preparers would complement this family-level work. We cannot reject the hypothesis that some people would benefit from the advance, but do not use it because of employer resistance. This suggests continued vigilance is due. It would be useful to further investigate what kinds of information commercial firms provide concerning the advance option. Larger lump sums mean potentially greater revenue from refund loans. Hence commercial tax services have no incentive to inform people about their advance options.

These findings, consistent with Thaler and Shefrin's (1981) behavioral life cycle theory, suggests that the spacing of income over time is not neutral, even during a time

period as small as a year. For the families in our sample, the combination of periodic wage income and lump sum EITC checks allows for both daily living and accumulation of large durable goods and assets. This research is suggestive and we hope it encourages additional work on household consumption theory, well being and issues surrounding EITC delivery and use.

Bernheim, B. Douglas, Jonathan Skinner, and Steven Weinberg. “What Accounts for the Variation in Retirement Wealth Among US Households?” NBER Working Paper No. 6227. Cambridge, MA: National Bureau of Economic Research, 1997.

Blank, Rebecca. “What Public Policy Research Should We Be Doing?” Lecture presented at the Institute for Policy Research at Northwestern University, Evanston, IL, February 1999.

Bos, Hans, Aletha Huston, Robert Granger, Greg Duncan, Tom Brock, and Vonnie McLloyd. *New Hope for People with Low Incomes: Two-year results of a program to reduce poverty and reform welfare.* New York: Manpower Demonstration Research Corporation, 1999.

Brock, Thomas, Fred Doolittle, Veronica Fellerath, and Michael Wiseman. *Creating New Hope: Implementation of a Program to Reduce Poverty and Reform Welfare.* New York: Manpower Demonstration Research Corporation, 1997.

Canedy, Dana. “Down Payment on a Dream.” *Ford Foundation Report.* New York, Ford Foundation. Winter 1998. <http://www.fordfound.org/QR.29.1/down/index.html> Downloaded February 18, 1999.

The Center on Budget and Policy Priorities. Earned Income Tax Credit Outreach Campaign Kit. Washington, D.C., 1998.

Clinton, William J. Remarks by the President at Income Tax Credit Event. December 4, 1998. www.whitehouse.gov/WH/New/html/19981204-27859.html Downloaded January 29, 1999.

Council of Economic Advisers. “Good News for Low Income Families: Expansions in the Earned Income Tax Credit and the Minimum Wage.” Washington, D.C., December 1998.

Edin, Katheryn. “The Role of Assets in the Lives of Low-Income Single Mothers and Non-Custodial Fathers.” University of Pennsylvania. Mimeo, 1998.

Edin, Katheryn and Laura Lein. *Making Ends Meet: How Single Mothers Survive Welfare and Low-Wage Work.* New York: Russell Sage Foundation, 1997.

Eissa, Nada and Hilary Williamson Hoynes. “The Earned Income Tax Credit and Labor Supply: Married Couples” University of California at Berkeley Working Paper. Berkeley: University of California, 1998.

Frank, Robert H. *Microeconomics and Behavior.* Third Edition. New York: McGraw Hill, 1997.

Friedman, Milton. *A Theory of the Consumption Function*. Princeton, NJ: Princeton University Press, 1957.

Greenstein, Robert and Isaac Shapiro. “New Findings on the Effects of the EITC.” Washington, DC: Center on Budget and Policy Priorities, 1998.

Internal Revenue Service. *The Earned Income Tax Credit (EITC)*. Washington, DC. Department of the Treasury, 1999a. http://www.irs.gov/prod/ind_info/eitc4.html downloaded November 12, 1999.

Internal Revenue Service. Form W-5. Washington, D.C.: Department of the Treasury, 1999b.

Levin, Laurence. “Are Assets Fungible? Testing the Behavioral Theory of Life-Cycle Savings.” *Journal of Economic Behavior and Organization*. 36 No1. (July 1998) 59-83.

Lusardi, Annamaria. “Explaining Why Households Do Not Save.” Joint Center for Poverty Research Working Paper. Chicago, IL: University of Chicago, 1999.

Meyer, Bruce D. and Dan T. Rosenbaum. “Welfare, the Earned Income Tax Credit, and the Employment of Single Mothers.” Joint Center for Poverty Research Working Paper. Evanston, IL: Northwestern University, 1998.

Modigliani, Franco and R. Brumberg. “Utility Analysis and the Consumption Function: An Interpretation of Cross-section Data.” In *Post Keynesian Economics*, edited by K. Kurihara. London: Allen & Unwin, 1955.

O’Donoghue, Ted and Matthew Rabin. “Doing it Now or Later.” *American Economic Review* 89 No 1. (March 1999): 103-124.

Oliver, Melvin L. “Building Assets: Another Way to Fight Poverty” *Ford Foundation Report*. New York: Ford Foundation, 1997.
<http://www.fordfound.org/QR.28.1/QR2814.html> Downloaded February 18, 1999.

Olson, Lynn M and Audrey Davis. “The Earned Income Tax Credit: Views from the Street Level.” Institute for Policy Research Working Paper. Evanston, IL: Northwestern University, 1994.

Souleles, Nicholas S. “The Response of Household Consumption to Income Tax Refunds.” *American Economic Review* 89 No. 4 (September 1999): 947-958.

Sherraden, Michael. *Assets and the Poor: A new American welfare policy*. Armonk, N.Y.: M.E. Sharpe, 1991.

Thaler, Richard H. and Hershey M. Shefrin. “An economic theory of self control.” *The Journal of Political Economy* 89 No. 2 (April 1981): 392-406.

Thaler, Richard H. “Psychology and Savings Policies.” *AEA Papers and Proceedings*. 84 No. 2 (May, 1994):186-192.

U.S. General Accounting Office. *Earned Income Tax Credit: Profile of Tax Year 1994 Credit Recipients*. GAO/GGD-96-122BR, Washington, DC: June, 1996.

U.S. General Accounting Office. *Earned Income Tax Credit: Advance Payment Option is not Well Known or Understood by the Public*. GAO/GGD-93-145, Washington, D.C.: February, 1992.

U.S. House of Representatives, Committee on Ways and Means. *Green Book, Background Material and Data on Programs within the Jurisdiction of the Committee on Ways and Means*. Washington: Government Printing Office, 1998.

Wisconsin Department of Revenue. Form 1A and WI-Z Instructions. Madison: State of Wisconsin. 1998a.

Wisconsin Department of Revenue. Wisconsin Tax Bulletin #111. Madison: State of Wisconsin. October, 1998b. badger.state.wi.us/agencies/dor/ise/111. Downloaded December, 1998.

Wisconsin Department of Revenue. Wisconsin Homestead Credit Schedule H and Schedule H instructions. Madison: State of Wisconsin. 1998b.

Zimmerman, Raymond A., Eason, Patricia, and Gowan, Mary. “Taxpayer Preference between Income Tax and Consumption Tax: Behavioral Life Cycle Effects.” *Behavioral Research in Accounting*. (1999):111-42.

Appendix

Fieldwork Templates

A general set of themes guided fieldwork collection. An abridged version is presented in Table A1. Tom Weisner and Cindy Bernheimer (UCLA) compiled themes based on previous work with low income working families, focus groups, and input from the New Hope advisory boards and staff. The New Hope research team also identified specific areas—such as the EITC—for more intensive data collection. Background information on the credit was provided to the fieldwork team, as well as the additional questions presented in Table A2.

[Table A1]

[Table A2]

¹ This research is supported by the MacArthur Foundation Research Network on Successful Pathways through Middle Childhood and the W.T. Grant Foundation. Romich has also received support from the MacArthur Foundation Network on Families and the Economy and a Spencer Foundation Research Training Grant. The Fieldwork and Qualitative Data Laboratory at UCLA assisted in analyses of some of the field notes and is funded by the Culture and Health Research Center, Department of Psychiatry, UCLA, and by NICHD grant #HD04612. We offer most vigorous thanks to Greg Duncan at Northwestern. Other helpful commenters and contributors included Bruce Meyer, Joe Altonji, Leslie McGranahan and members of the ethnographic team—Drs. Cindy Bernheimer and Eli Leiber at UCLA and field workers Victor Espinosa, Christina Gibson, Eboni Howard, Katherine Magnuson, Nelle Chmielewski and Devarati Syam. Brandi Stewart and Ricardo Rivera provided timely research assistance. A final thank you to the families whose participation makes this work possible.

² Modigliani and Brumberg (1954) receive credit for development of this theory. Friedman's (1957) permanent income hypothesis mirrors the life cycle hypothesis (Frank, 1997). We refer only to the life-cycle hypothesis for the sake of simplicity.

³ Another way to conceptualize the difference is to calculate the interest earned on the money if it were invested. The actual foregone interest is modest. A household who qualifies for the maximum advance of \$115.58 per month and faces a ten percent interest rate loses \$89.60 in net future value by choosing a pure lump sum delivery rather than the advance payment.

⁴ The phrase 'self control' is meant to evoke connection to body of work in economic literature, not as a moral characterization. The term is used in the economic work that seeks to explain inconsistent and present-biased consumption patterns, a phenomenon that spans all income levels. See O'Donoghue and Rabin (1999) for a review of how economic theory specifies self-control.

⁵ The sample was stratified by experimental status, ethnicity, number of parents in household and date of program entry. New Hope recorded ethnicity as African-American, Latino, White, and "other." Many of the latter group were Asian, mostly recent Hmong refugees resettled to Milwaukee. Because of the complexity of Hmong culture and language, and the need for a specialized study of this group, Hmong were excluded from the ethnographic sub-sample.

⁶ Of these, one acknowledges she is non-compliant and fears audit.

⁷ This likely represents the difference in timing between the administrative and ethnographic data. Many sample members were not working in 1996, but joined the formal labor market by the time of our study. Additionally, part of this discrepancy is due to sample members who—legally or illegally—do not file taxes.

⁸ This woman worked steadily in 1998. Her combined refund/EITC for 1998 was \$3500. She did not complain about the smaller-than-expected check, perhaps because tax time coincided with a promotion from \$8 per hour to a salaried job at \$28,000 per year.