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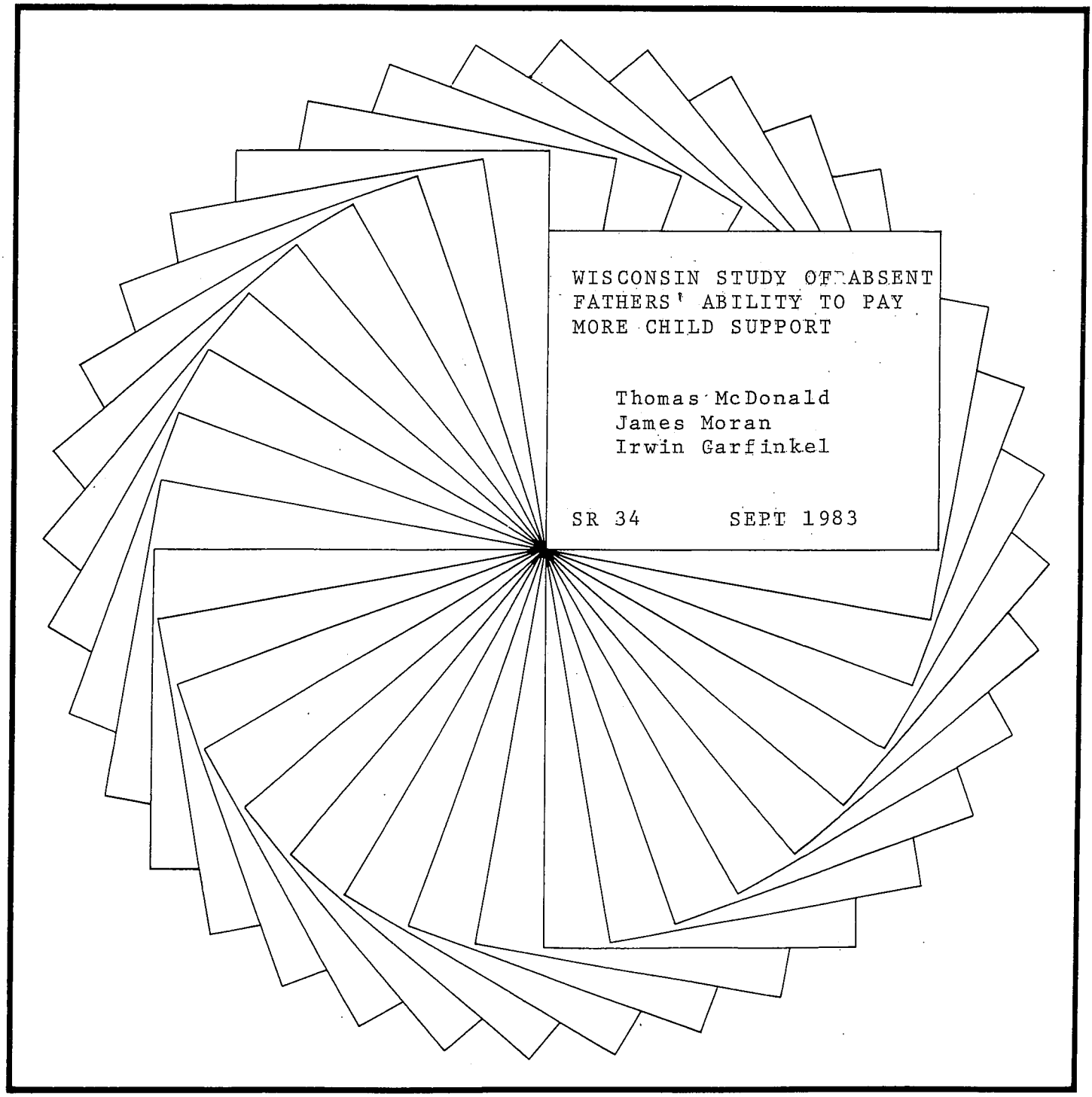

Institute for Research on Poverty
Special Report 34

Wisconsin Study of Absent Fathers' Ability to Pay More Child Support

by

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September 1983

Wisconsin Department of Health and Social services
Division of Economic Assistance
and
Institute for Research on Poverty

This report was made possible by Social Security Administration Grant No. 18-P-00178-01. McDonald was the principal investigator and wrote most of the report. Moran did virtually all of the computer work and wrote the rest of the report. Garfinkel supervised data collection, designed the research project, and was the principal author of the funding proposal.

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STUDY OVERVIEW

This study begins with a sample of AFDC mothers, identifies the absent fathers of their children, and then estimates the ability of the absent fathers to pay more child support than they are currently paying. Data from the (1) Wisconsin Computer Reporting Network, (2) county child support agencies, and (3) federal and state income tax records are utilized. Use of actual tax records makes this study unique in that previous studies have used indirect methods to estimate the incomes of absent fathers. The major weakness of the study, however, is that because tax records could be obtained in six months time for only one-third of the original sample, an indirect method had to be used to estimate incomes for two-thirds of the sample.

In addition to estimating the ability of absent fathers to pay more child support, the impact of several administrative strategies are examined, as are the resulting effects on the incidence of poverty, welfare caseloads, and welfare costs.

Results of this study show that there is a potential for increased child support from the absent fathers of AFDC children. The amount of the increase varies considerably, depending upon the particular normative standard or set of value judgments that guide the determination of ability to pay. Assuming 100 percent collection effectiveness and support orders for all absent fathers, increases in child support in Wisconsin range from $32 million to $163 million for the three normative standards used in this study. This is a maximum estimate and other estimates using more realistic assumptions are presented. But more important, even if collection is a great deal less than perfect, the range remains enormous, and depends upon which value judgments are adopted.

Obtaining support orders for absent fathers currently without them, while holding the dollar amount of orders and collection effectiveness to current performance levels, results in increased child support of $19.2 million.

Concentrating efforts on only those absent fathers who currently have support orders and adjusting the order dollar amounts to correspond to the three normative standards used, results in a loss of $18 million for the New York Community Council Guidelines contrasted with a gain of $15 to $16 million for the Wisconsin Division of Economic Assistance Guidelines or the Wisconsin Percent of Income Standard. Wisconsin standards, however much their particular details differ, are substantially tougher on average than New York City standards.

Collecting 100 percent of what is currently owed by absent fathers with support orders results in an increase of $25.6 million.

In short, improving only any one aspect of the collection system leads to only modest increases in collections. But simultaneously improving the incidence of awards, the levels of awards, and the collection of payments could lead to a dramatic increase in collections.

Because of the 100 percent marginal tax rate on AFDC grants for child support payments, the above increases in child support have virtually no effect on the incidence of poverty for AFDC families and only a minimal effect on welfare caseloads. However, reduction in welfare costs are substantial.

ACKNOWLEDGMENTS

The authors of this study would like to thank the personnel of the county child support agencies, the Wisconsin Child Support Office, the Wisconsin Department of Revenue, and the Federal Internal Revenue Service for their participation. Special thanks go to Donald Oellerich of the Institute for Research on Poverty, who consulted with us on many issues, including the use of the Heckman procedure to correct for selectivity bias.

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Final Report

INTRODUCTION

In January 1982 staff of the Institute for Research on Poverty (IRP), University of Wisconsin-Madison, under contract to the Wisconsin Division of Economic Assistance (DEA), began work on a study designed to address several key issues involving child support collections for the state's AFDC population. There are four primary objectives of this project:

1. To compare the costs and benefits of obtaining data from both state and federal income tax returns on the income and number of child dependents of absent fathers of children on AFDC in Wisconsin.

2. To estimate absent fathers' ability to pay child support based on income and several normative standards and calculate how much more child support absent fathers can afford to pay.

3. To estimate the potential increases in child support that could result from the state giving priority to pursuing particular kinds of absent fathers, based on the characteristics of the custodial mother, to increasing the number of child support awards, and to increase the amount of awards and/or the collection effectiveness.

4. To predict the effect of increases in child support collection on the income and poverty status of children and on welfare costs and caseloads.

We believe this project addresses issues which are central to any discussion of the potential enhancement of the economic status of

children and reduction of the states' income support role by improving the child support system. To date no one has effectively measured just how much potential support money is actually available. This project utilizes the Wisconsin Computer Reporting Network data base, county child support agency case records, and state/federal tax returns to develop a data base upon which to conduct this analysis.

STUDY DESIGN

A. Sample Selection

Much of our activity in the first two months of the study focused on identification of the best procedure for sample selection. After rejecting two alternatives from our original proposal, we chose to use the state's Computer Reporting Network (CRN) to generate our sample.[1] The State of Wisconsin uses a combined application form by which an applicant is considered simultaneously for AFDC, Food Stamps, and Medical Assistance. The application is coded for machine processing. Data are entered from remote interactive terminals in the county agencies, and eligibility is determined by programs in the state's central computer. The CRN maintains case level data for all active cases. This file is updated monthly. The large size of these monthly files makes them unwieldy for data analysis. However, another joint DEA/University project has developed software for generating random samples from the raw files, extracting selected variables, and converting them to a file which can be read using established programs.[2] We obtained excellent cooperation and assistance from staff associated with this project and were able to use their procedures to generate our sample.

Our sample is based on a 4 percent random sample from the September 1980 CRN file. July 1980 would have been the more logical and desirable month to sample, since tax data and payment records are for January-December 1980. However, only 72 percent of the counties, representing 88 percent of the AFDC cases, were loaded on the CRN as of July 1980. In September 1980, 90 percent of the counties, representing over 95 percent of the AFDC cases, were fully loaded on the CRN.[3]

Our 4 percent CRN sample yielded 2864 AFDC households. These included two-parent families (AFDC-U, incapacitated) and families with absent parents resulting from death, divorce, separation, annulment, abandonment, military service, prison, incapacitation or disability, parents never married, and other continued absence.[4] The next step was to select our families with absent parents who could be expected to pay child support (i.e., excluding families in which the absent parent was either dead or incarcerated or present but incapacitated). This step in the selection process excluded 275 families.[5]

We decided to further restrict our sample to absent father cases alone. Inclusion of cases with absent mothers or both parents missing would have complicated our data collection and the situations occurred too infrequently to permit special analyses. Thus these 187 cases were eliminated from the sample. Our sample then consists of 2402 AFDC households, which contain at least one child living with his/her natural mother while the child's natural father is absent from the home for reasons other than death or incarceration.

B. Data Collection

Data for this study were obtained from four sources: (1) state Computer Reporting Network (CRN); (2) county child support agencies (CCSA); (3) Wisconsin Department of Revenue (DOR); and (4) federal Internal Revenue Service (IRS).

CRN. In addition to providing our sampling frame, the CRN was the basic source of information concerning the custodial mothers. A computer file containing variables for each mother was developed in July 1982 and later matched with information from the other data sources.

CCSA. This was the most difficult part of our data collection effort and consumed most of the summer months of 1982. In generating our sample list from the CRN, Institute programmers also identified the social security number for the custodial mother and the county of residence and attached our own identification number. The names and social security numbers of the custodial mothers were then sent to the appropriate county CSA. Each county CSA was asked to complete the requested information on Form 1 (see Appendix A) for each case, to provide names and social security numbers for absent fathers and records of payment for 1980. In some instances the court order was not within the county of residence for the custodial mother. When this occurred, the county CSA was asked to indicate the correct county on Form 1 and return the form to project staff for forwarding.

One notable exception to the process described was Milwaukee, where project staff, using court case numbers (see Form 2, Appendix A) obtained the required data for Form 1. Two other large counties (Dane and Rock) indicated an inability or unwillingness to complete our forms. In both of these counties project staff reviewed records and obtained the required data.

Due to lack of response from two small counties our sample size was reduced from 2402 to 2375 mothers. At least one absent father (AF) was identified for 2021 (85.1 percent) of these mothers. Since multiple absent fathers were identified for some of these mothers the total number of absent fathers exceeds the number of mothers. A total of 2259 absent fathers were distributed among the 2021 mothers as follows:

1813 mothers → 1 absent fathers identified
181 mothers → 2 absent fathers identified
24 mothers → 3 absent fathers identified
3 mothers → 4 absent fathers identified

Treatment of the 354 mothers for whom no absent father could be identified is dealt with in the discussion of data file construction below. Of the 2259 identified absent fathers, social security numbers (SSN's) were obtained for only 1468 (64.9 percent).

DOR and IRS. In August 1982 we processed the SSN's of the absent fathers through the Wisconsin Department of Revenue (DOR). Because we did not obtain all SSN's on schedule, only 1430 of the (1468) SSN's were processed in an attempt to obtain state tax returns.

Several considerations, including time and cost, convinced us to check state tax records first. Obtaining the Internal Revenue Service

(IRS) data proved to be extremely time consuming. It took several months to obtain the needed data. Group I information from IRS computerized master files would have been more readily and cheaply obtained. However, the computerized file is updated continuously and contains only the most recent return. Thus our requests would have yielded tax data for 1981. To obtain 1980 data required a Group II request, which was slower, more costly, and required that we know the state of residence for the absent father for 1980.

In addition, we felt that most of the absent fathers would still reside in the state, and Wisconsin's more liberal tax credit program provided an additional incentive for low income individuals to file a state tax return.

Accessing Wisconsin Department of Revenue records for purposes of our study was greatly facilitated by past cooperative efforts and existing policy guidelines for exchanges of information between the Department of Health and Social Services and DOR. Although a separate agreement for matching our sample with 1980 state tax data was required, cooperation from DOR administrators was excellent, and administrative approval was quickly obtained. DOR personnel were equally cooperative and extremely competent.

DOR tax files are computerized and available by tax year. Software had already been developed for matching externally generated samples with the DOR files. Project programmers supplied a tape containing social security numbers and project generated case identification numbers to DOR

data-processing staff, who ran it against their file, pulling data for matching cases. A tape containing tax data for matched cases was returned within two weeks of our request. The cost charged by DOR for processing our 1430 requests was $570, or 40 cents per request, as compared to $2.70 per (Group II) request to IRS. It should be noted, however, that the cost for the DOR search is determined by size of the DOR tax file, not by the sample size. More or fewer sample cases would have resulted in the same billing.

Processing the 1430 SSN's through the DOR resulted in 821 tax returns for 1980. Forty-three of these returns were later determined to be invalid, since the names did not match the absent father names. The problem was incorrect SSN's on our data forms, which had been completed by the CCSA's. The cases which did not match the DOR records were then processed through the IV-D Federal Parent Locator Service to obtain addresses. This was the first step in attempting to obtain IRS data for these 609 cases. The Parent Locator Service checks two sources for an address based on the absent father's SSN and last name. They check the wage history records at Social Security Administration (SSA) and the tax return records at IRS. Both SSA and IRS provide the latest address they have and indicate what year it comes from. SSA updates their parent locator addresses only once a year and they are about a year behind. At the time we requested information, the 1980 records were on the file. This means that if an absent father had SSA wage withholding in 1980 we obtained the address of his 1980 employer. If the parent did not have 1980 wages, the address was for the last year on the records.

We made 609 Parent Locator requests and received information back on 582. Addresses were provided for 419 absent parents, and no address was furnished for the remaining 163. Reasons given for no address on the 163 were (1) name and SSN did not match (98); (2) SSN not yet issued (14); (3) file not available at SSA and SSN not on IRS records (49); and (4) self-employed on SSA records and SSN not on IRS records (2). Of the 419 addresses obtained, 259 were out-of-state and 160 were in Wisconsin. Parent Locator information arrived late for 25 of the out-of-state cases, so only 234 were processed through the IRS system to obtain 1980 tax returns. IRS responded to these requests with the following data: (1) tax returns (146); (2) no return filed (83); and (3) no response from IRS (5).

In processing the 160 Wisconsin addresses, we concluded that since there was no DOR return on these cases, there was little likelihood of an IRS return. Based on this assumption, we decided not to pursue these cases through IRS. However, prior to this decision, 65 of these cases had already been requested from IRS. Of these 65 requests IRS eventually provided 30 tax returns. Thus in retrospect our decision not to pursue these cases with IRS was a mistake. By the time we discovered this it was too late to make the additional IRS requests. IRS information obtained on the 419 Parent Locator addresses is summarized in the table below.

	Out of State	Wisconsin	
IRS Return	146	30	176
No Return Filed	83	35	118
No Response	5	0	5
Not Requested	25	95	120
	259	160	419

Data File Construction

Although our original sample is of AFDC families, much of our analysis requires a file of absent fathers. These are not equivalent, since multiple absent fathers exist for some AFDC mothers.

A major methodological problem encountered in this study involved the treatment of missing data. This required a series of rather complex decisions and procedures which began with the construction of the absent father file and the question of how many absent fathers to assign to each mother.

The sample of mothers was chosen on the criterion that at least one of their children had a living absent father, yet we were unable to identify any absent father for 354 (14.9 percent) of the mothers. This led us to consider the possibility that we had not identified all of the absent fathers, even for the cases in which we had identified one or more. To examine this issue we utilized CRN data to look at the number of last names of children eligible for child support in each family.

We compared the number of last names of the eligible children in each family to the number of absent fathers we had identified for each family and utilized the following decision rules:

> If the number last names < number absent fathers identified we a assumed we had identified all of the absent fathers for that family.
>
> If the number last names > number absent fathers identified we assumed that the count of last names was more accurate and we assigned dummy absent father records for the extra names.

The result was the addition of 186 absent father records beyond the 354 which we originally did not identify. Thus our final sample of absent fathers has 2259 that we identified and 540 that to the best of our knowledge exist, but which we were not able to identify. These 2799 absent fathers are distributed among the 2375 mothers as follows:

1995 mothers → 1 absent father
340 mothers → 2 absent fathers
36 mothers → 3 absent fathers
4 mothers → 4 absent fathers

We expect that this is a somewhat low estimate of the number of absent fathers, since in some families all the children may take the mother's last name, even if the children have different fathers.

ANALYSIS AND FINDINGS

A. Overview

The analysis is intended to first answer the question of whether absent fathers can pay more child support. To do this we (1) estimate the absent father's income; (2) couple the income estimate with several normative standards to derive an estimate of ability to pay; and (3) subtract the amount of child support that is currently paid from the estimate of ability to pay child support.

The above analysis addresses the primary issue of concern to this study. After determining the extent of absent fathers' ability to pay more child support, the analysis turns to the question of what state practices can be expected to lead to the greatest benefits (i.e., higher collections). To answer this question we first determine if priority should be given to pursuing absent fathers based on the characteristics of the custodial mother. We then compare potential gains derived from giving priority to (1) getting more support orders; (2) increasing the size of support awards; and (3) increasing the effectiveness of collection.

The final section presents the findings of an analysis of the potential for increased child support collections to reduce poverty and welfare costs and caseloads.

Throughout the analysis we were forced to make assumptions which may significantly affect our results. In these situations we have attempted to first determine the direction and magnitude of the effect alternative assumptions may have on our estimates. We then generate maximum and minimum values over which one might expect the estimates to range, depending upon which set of assumptions holds true. The reader can then assess where on the continuum lies the estimate which fits his/her particular situation or belief system based on the selection of appropriate assumptions.

B. Estimating Income

A major shortcoming of past studies of absent fathers' ability to pay more child support has been the lack of direct measures of the absent fathers' income. This has led to the need for devising various methods

for imputing incomes for absent fathers based on subsets of absent fathers or on attributes of custodial mothers. This study attempted to overcome these problems by obtaining income data for absent fathers directly from state and federal tax returns. Actual incomes from Wisconsin state tax returns were obtained for 778 subjects. Of those not available from the state, incomes for an additional 176 subjects were obtained from federal tax returns. Due to some duplication of requests, the combining of these two sources results in a total of 943 rather than 954 cases. The average gross income for these 943 absent fathers is $11,182 (standard deviation = $7905).

There are a number of possible options for treating the missing income data for the remaining 1856 cases. Since we employed all of the procedures available to the IV-D office to obtain income data for identified absent fathers, one could argue that it is unlikely that the missing data cases have any income which could be collected through existing procedures. However, assigning zero income to all cases in which data are missing would be an extremely conservative estimate which is, we believe, not justifiable. In most counties we cannot be certain that all identifiable absent fathers from the case records were actually recorded on our data forms. The state and federal tax record matching procedures are not totally reliable. Most important, the intent of the study is to determine potential increases in child support which could result from changes in procedures that would lead to more fathers being identified, located, and having support obligations established and collected.

For these reasons, we attempted to devise a methodology for imputing income values for absent fathers for whom we were not able to obtain income data from state or federal tax returns. The methodology involved using the sample of absent fathers for whom we have income data to estimate an equation in which income of the absent father is the dependent variable and the independent variables consist of the characteristics of the custodial parent. (See Appendix B for complete listing.) The coefficients from the independent variables in this equation are then used to predict absent father income for the remaining 1856 cases with missing income data.

This methodology assumes that missing income data are random. There are, however, several reasons for expecting that missing data will not be random. Missing income data can result from three situations: (1) the absent father cannot be identified (540 cases); (2) the absent father is identified but a valid social security number is not available (946 cases); and (3) no income tax return was filed for the study year (370 cases). Since there is a financial incentive for both the custodial parent and the IV-D agency to identify absent fathers and their social security numbers, lower income absent fathers may be identified and pursued less actively than higher income absent fathers. In addition, lower income persons are clearly less likely to file income tax returns. In these cases the use of the above described procedure may lead to an overestimate of the absent fathers' income for missing data. Heckman has developed a two-stage procedure for testing and, if necessary, correcting for this kind of bias, referred to as selection bias.[6] This procedure was used in the analysis of our data for the modeling of absent fathers' income.

The first step in the Heckman procedure involves the estimation of a probit equation in which the sample consists of all absent fathers (in the constructed absent father file). The dependent variable is a dichotomous variable which takes the value one if the income information is available, zero if it is missing. The independent variables consist of the attributes of the custodial parent. This equation is, in effect, an attempt to model the selection process whereby data come to be missing for some cases in the sample.

After a preliminary analysis showed relatively strong race interaction effects in the predicted income equation (particularly with education), it was decided to run separate models for whites and nonwhites. The results from the probit analysis are shown in Table 1. In the independent variable list in Table 1 some of the original custodial parent attributes listed in Appendix B have been eliminated as a result of earlier analyses which showed that they were nonsignificant.

For nonwhites, age is the strongest predictor of ability to obtain income information. The linear and quadratic age terms must be read together. In the relevant range, they indicate that the older the custodial mother the more likely one is to obtain icome data on the absent father. Marital status is the best predictor for whites with a significantly decreased probability of obtaining income information on the absent father if the mother has never married. If the custodial mother lives outside a city and has less than a high school education, the probability of obtaining income data on the absent father is decreased for both whites and nonwhites.

Table 1

Probit Analysis--Dependent Variable Equals One if Data are Available on Absent Father's Income

Independent Variables (Custodial Mother)	Nonwhites (N = 1,084) Coef.	S.E.	T-statistic	Whites (N = 1,715) Coef.	S.E.	T-Statistic
Age (in years)	-.0970	.0406	2.39	-.0550	.0300	1.84
Age squared	.0013	.0006	2.17	.0006	.0004	1.49
Education dummies						
< than 9 years	-.3332	.1837	1.81	.1074	.1598	0.67
9-11	-.1113	.0979	1.14	-.1677	.0710	2.36
> than 12 years	.2019	.1478	1.37	-.0368	.1012	0.36
Never married	-.0987	.0974	1.07	-.5869	.0915	6.41
Number of children dummies						
two	.1164	.1175	0.99	.1387	.0807	1.72
three or more	.1591	.1247	1.28	-.0245	.0906	0.27
Working dummies						
part-time	-.1128	.2594	0.43	.2097	.1333	1.57
full-time	.3443	.1145	3.01	.1022	.0811	1.26
Dummy for living in a city	.4456	.2383	1.87	.1287	.0629	2.05
Constant	.4186	.6893		.8253	.4874	
	$\chi^2 = 25$, 11 d.f., $p \leq .01$			$\chi^2 = 67$, 11 d.f., $p \leq .001$		

While of interest, the results of the probit analysis serve primarily as a mechanism for the construction of a new variable for each absent father. This new variable, denoted lambda, is used in the second stage of the Heckman procedure. The second stage consists of estimating an ordinary least squares (OLS) equation in which the sample is restricted to those having complete income data, the dependent variable is the absent father's actual income, and the attributes of the custodial mother and lambda are the independent variables. Again, we estimate separate equations for whites and nonwhites. Note that, except for the inclusion of the variable lambda, these equations are identical to the probit equations of Table 1. The inclusion of the variable lambda is intended to purge the coefficients of the custodial parent attribute variables of the selectivity bias, which arises if the missing data are related to the income of the absent parent. The coefficient for the new lambda variable serves as a test of the existence of selection bias which is not adequately controlled by the other independent variables in the equation.

In our second-stage analysis the coefficient for the lambda term was found to be insignificant in both equations (whites and nonwhites). These results are presented in Appendix C. This finding allows us to omit the lambda term and proceed to estimate the income equation under the assumption of random missing data. Results from this OLS regression are shown in Table 2.

For nonwhites, age and education (greater than 12 years) of the custodial mother and whether she lives in a city are strong predictors of the absent the father's income. Age of the custodial mother and urban residence are also significant predictors of the absent father's income for the white subsample.

Table 2

Estimating Income - OLS Regression Equation

Independent Variables (Custodial Mother)	Nonwhites (N = 244)			Whites (N = 699)		
	Coef.	S.E.	T-statistic	Coef.	S.E.	T-Statistic
Age (in years)	834.2	424.3	1.97	1400.	305.6	4.58
Age squared	-8.374	6.313	1.33	-18.26	4.458	4.10
Education dummies						
< than 9 years	-860.8	2000.	0.43	-1945.	1475.	1.32
9-11	491.8	956.8	0.51	508.1	699.3	0.73
> than 12 years	4511.	1368.	3.30	-1483.	964.0	1.54
Never married	-97.55	1001.	0.10	-1198.	981.8	1.22
Number of children dummies						
two	-1043.	1148.	0.91	-302.7	776.1	0.39
three or more	-1004.	1261.	0.87	-68.81	892.2	0.08
Working Dummies						
part-time	-4800.	2734.	1.76	419.7	1203.	0.35
full-time	-1792.	1077.	1.66	-314.5	764.3	0.41
Dummy for living in a city	6366.	2771.	2.30	1335.	612.2	2.18
Constant	-12,262.	7339.		-13,115.	4892.	
	R^2 = .162, F = 4.07, d.f. = 11; 232			R^2 = .084, F = 5.75, d.f. = 11; 687		

The equations in Table 2 were then used to impute income for the absent fathers with missing income data. As noted earlier, the average income for the 943 cases for whom we obtained income data was $11,182. The average imputed income for the 1856 cases with missing data was $10,683. The overall average income for the entire sample (2799) of absent fathers is $10,851 (s.d. = 5121).[7]

C. Estimating Ability to Pay

The absent father's gross income must be adjusted to accurately reflect his ability to pay. These adjustments require explicit normative standards which operationalize judgments regarding definitions of family, income, needs of the absent father and new dependents and of the custodial mother and children, assets of the absent parent, allowable deductions, and the extent of the absent parent's obligation.

The subjective nature of these judgments has resulted in a variety of normative standards. We chose three to apply to the data from our study: (1) the Community Council of Greater New York, Guide for Determining the Ability of an Absent Parent to Pay Child Support;[8] (2) Child Support Guidelines of the state of Wisconsin;[9] and (3) Wisconsin Percent of Income Standard developed by the Institute for Research on Poverty.[10]

Our data do not permit us to apply all standards at the level of complexity they were designed. However, we are able to consider what we believe to be the essential components of any standard: income of the absent father, number of children in need of support, and number of new dependents. The first two standards use net income while the third uses

gross income. Gross income is reduced by state, federal, and FICA taxes to obtain net income. The average net income for our sample of absent fathers is $8686 (s.d. = $3550).

Since there are multiple absent fathers for some mothers, a method had to be devised to allocate AFDC children to these fathers. If a support order existed, the number of children in the order defined the number for whom that father was responsible; the remaining children were divided between the other absent fathers for that mother. If no support orders existed for any of the children of a custodial mother with multiple absent fathers, the children were divided equally among the fathers.[11] In situations in which there was only one absent father for a custodial mother, all children of an absent father were allocated to that father.

The actual number of new dependents was available only for absent fathers for whom we had obtained a state tax return and who had a child support order. This subsample (N = 643) was used to estimate a model which was then used to arrive at the predicted number of new dependents for the cases with missing data. The procedure followed was similar to that used to test for sample selection bias in estimating income. Separate equations were run for whites and nonwhites. As was the case in the income equations, the Heckman term proved to be insignificant, indicating no significant selection bias. A multiple logit model was then estimated using the sample of cases with data on the number of new dependents. This equation was then used to arrive at a predicted number of new dependents for the missing data cases (see Appendix D).

New York Community Council Standard

The Community Council Guide (CCG) assesses the absent parent's economic status relative to the lower level living standard of the Bureau of Labor Statistics[12] to determine the parent's ability to provide child support and the specific amount of the child support obligation. Gross income of the absent parent is adjusted for certain allowable mandatory deductions and for allowable deductions for special needs. As noted above, our gross income estimate is adjusted for state, federal, and FICA taxes. The CCG would also allow deductions for state unemployment insurance tax, state disability insurance and union dues, and other retirement contributions if required as a condition of employment. Our inability to consider these deductions inflates our net income figure. However, the CCG also recommends that the cash value of certain assets be considered in establishing ability to pay. Since we are unable to consider assets, this may balance the effect of additional deductions.

The CCG defines the absent parent's ability to provide child support as the "margin," or excess funds available to the parent after allowances have been made for the cost of the appropriate budget standard (referred to as the "Family Maintenance Standard"), and allowable deductions. The family maintenance standard is shown in Table 3. The average family maintenance standard for each absent father and his new family (if it existed) was found to be $9208 (s.d. = $1153). The recommendation of the CCG is that the child support payment not be the total margin so as to provide a work incentive for the absent parent, but that it be a substantial share of the margin. Ninety percent is suggested.

Table 3

Family Maintenance Standard--New York
Community Council Guidelines

Family Size	Equivalence Weights[a]	Annual Amount
1	.52	$ 6,341
2	.68	8,292
3	.84	10,243
4	1.00	12,914
5	1.16	14,145
6	1.32	16,096
7	1.42	17,315
8	1.52	18,535

Note: Based on Bureau of Labor Statistics 1980 Lower Budget for a four person family.

[a]Weights used by Community Council, devised for Public Services Administration. Federal Register, Vol. 40, No. 125, June 27, 1975.

The final consideration in arriving at the child support obligation under the CCG is consideration of the circumstances of the custodial family. The BLS lower level living standard is also used to define the custodial family's need. Final determination of the absent parent's child support obligation is based on the following decision rules:

--If the custodial family's income is below the level of the Family Maintenance Standard, 90 percent of the absent father's margin is applied toward raising the family to that level.

--If the child support payments raise the custodial family's income to such a minimum adequate standard, any excess absent parent's funds available for child support (i.e., 90 percent margin) are divided equally among all dependents for whom the absent parent is legally responsible and the absent parent.

--If, prior to the adjudication of child support, the custodial family has income equal to or above the Family Maintenance Standard, the absent parent's funds available for child support should be divided equally among all dependents for whom that parent is legally responsible and the absent parent.[13]

Applying these decision rules to our data yields an average annual ability to pay for the entire sample of $736 (s.d. = $1598, min = 0, max = $19,248). Fifty-nine percent of the sample could afford no child support payment under the CCG. The average ability to pay for those who could afford to pay something (N = 1139) was $1810 (s.d. = $2083).

Wisconsin Standard

The Wisconsin DEA Standard[14] is very similar to the New York CCG in the basic concepts that are included for consideration: needs of families of both custodial and absent parent, income of the absent parent and custodial parent, and allocation of resources above some minimal standard. It differs significantly, however, in the actual application of these concepts.

The Wisconsin Division of Economic Assistance Guidelines (DEAG) uses a lower standard of need ($4800 per year) and ignores new dependents in calculating the absent parent's obligation toward meeting the basic needs (Basic Allowance) of the children in the first family. This means that a greater proportion of the absent parent's income is defined as "margin," or excess income. Also the DEAG claims 100 percent of this margin as available to meet child support obligations up to the Basic Allowance level of the children. Once the basic level is met, an allowance for new dependents is deducted to determine the net income available for "support above the Basic Allowance." Support above the Basic Allowance is determined as a percentage of the net income (15 percent for the first child, and 10 percent for each additional child with a support obligation). Implicit in the DEAG is a strong value judgment regarding the priority of the absent parent's obligation to provide a minimum level of support to children in the first household before the needs of any new dependents are considered.

When both the custodial and absent parent are working and able to provide child support, the amount of money each parent contributes to the Basic Allowance is determined by adding together the amount of money each has available after meeting his/her own self-support needs, determining the percentage each contributes to the total available, and multiplying the percentage by the Basic Allowance needs of the children. In the case of our sample of AFDC custodial mothers with low earned incomes, this procedure is likely to increase the amount of the absent father's obligation.

As expected, the Wisconsin standard led to a substantially higher estimate of ability to pay than the New York standard. In applying the DEAG to our sample, we arrived at an average annual ability to pay of $2627 for the entire sample (s.d. = $1649).[15] Only 11 percent of the sample could afford no child support payment under this standard. Of those who had an ability to pay greater than zero, the average was $2968 (s.d. = $1434).

Wisconsin Percent of Income Standard

The distinguishing characteristic of the this standard is its simplicity. To calculate the ability to pay for the absent parent, the Wisconsin Percent of Income Standard uses "tax rates" of 17, 25, 29, and 31 percent of gross income for 1, 2, 3, and 4 or more children respectively. The application of these rates has an upper limit of $50,000 gross income.

Applying this standard yields results quite comparable to the DEAG. The average annual ability to pay is $2305 (s.d. = $1345).[16] Since there is no lower income limit with this standard, only two cases, with zero imputed income, had zero ability to pay. The lack of a lower income limit reflects a belief in the importance of establishing and maintaining continuity in the absent father's support obligation regardless of how small this might be (in actual dollars) for some absent fathers.

Summary

Defining the absent parent's ability to pay child support is largely a subjective process requiring judgments concerning definitions of

resources, need, and the priority of obligations. The Community Council of Greater New York and Wisconsin Division of Economic Assistance guidelines take different approaches in operationalizing these definitions, which result in widely different estimates of absent parents' ability to pay for our sample ($736 vs. $2627 respectively). The exact differences between the estimates is, in part, a function of the distribution of the relevant variables in the population considered. While application of these standards in different sites with different populations would be expected to yield different results, one should generally find the CCG standards to be more lenient on the absent parent in establishing his/her ability to pay.

The Wisconsin Percent of Income Standard offers a much more simplified procedure which yields results close to the DEA guidelines for Wisconsin.

D. Comparing Ability to Pay and Current Payments

The procedure for estimating how much child support absent fathers currently pay is relatively straightforward and not complicated by sample selection bias issues. Records of payments were readily available from IV-D agencies. Monthly child support payments can be simply summed over the year. Payments on arrearages were counted for the month of payment rather than for the month owed. The latter was not possible and not necessary, we felt, since arrearage payments should average out over several years (i.e., the same proportion of missed payments in the study year will be paid as arrearage in the following year).

Some absent fathers may be making payments other than child support. The most obvious is alimony. The federal income tax creates an incentive for the absent father to pay alimony (which is tax-deductible) rather than child support (which is not). In no cases in our sample were fathers paying alimony and not child support. For those cases with alimony and child support payments we derived two estimates of child support, one with and one without alimony added. Because the numbers were virtually identical we report only the latter.

Moreover in more recent court rulings, judges in Wisconsin began issuing "family support" orders, which do not distinguish alimony and child support. Because only 5 fathers paid family support, it was treated as equivalent to child support.

Property settlements and in-kind payments could not be incorporated into the analysis because reliable data could not be obtained.

In short, in assessing ability to pay more, we subtract from ability to pay the total of child support, and family support. Table 4 presents the estimates of ability to pay more child support for each of the three normative standards.

Thirty-one percent of our sample (865 absent fathers) had made some payment during the study year. Some of these absent fathers were actually paying more than the standards defined as their appropriate ability to pay. Indeed, 63 percent of the absent fathers who made some payment during the year actually paid more than the Community Council Guidelines would recommend. Under the stricter Wisconsin guidelines and Percent of Income standards, only 17 and 7 percent repectively of the absent fathers currently make payments greater than the guideline recommends.

Table 4

Average Annual Ability to Pay More Child Support
(N = 2,786)

Standard	Ability to Pay Minus Child Support[a]
N.Y. Community Council Guidelines	$ 457 (1,487)
Wisconsin DEA Guidelines	2,347 (1,612)
Wisconsin Percent of Income	2,022 (1,262)

Note: Standard deviations in parentheses.

[a]Includes 5 cases with family support.

Summary

The results shown in Table 4 demonstrate the inequity of the current support system. While absent fathers, on average, pay less than they are able, some fathers actually pay more than most standards would require.

In answer to the question, can absent fathers afford to pay more child support, our data support an affirmative answer. Whether this amount is "substantial" depends heavily on the standard used. In no case, however, do the amounts appear inconsequential. The $457 average annual increased payment per father resulting from application of the Community Council Guidelines represents almost $32 million per year for the AFDC population in Wisconsin. Extrapolation of the Wisconsin DEA Standard yields over $163 million, while the Wisconsin Percent of Income Standard results in $141 million for the Wisconsin AFDC population.

Of course these figures represent a potential revenue for child support which can only be realized if all absent fathers are identified, court orders are obtained, and support obligations are collected. Our analysis now turns to an examination of how these potential benefits can best be realized.

E. Means of Collecting Additional Child Support

What are the potential gains to be realized from the different means of collecting more child support? We first look at the possibility of pinpointing those absent fathers most able to pay more child support, by analyzing the known attributes of the custodial AFDC mother.

We then address the question, Should priority be given to (a) obtaining more support orders, (b) getting higher awards, or (c) better

enforcement of existing awards. To answer these questions fully we would need estimates of both the benefits and costs of each of the alternative strategies. This analysis, however, is limited to measuring benefits. We estimate the maximum potential increase in child support payments for each type of intervention, holding constant performance at current levels in the other areas. For example, to estimate the effect of better enforcement, we hold constant the number of support orders and level of awards.

For each of the analyses, three estimates (based on the three normative standards) of the absent fathers' ability to pay are used. The methodology for estimating the potential gains resulting from each of the procedures differs and is therefore described separately.

Targeting Absent Fathers Based on the Characteristics of the Custodial Mother

To test the potential for targeting absent fathers with high ability to pay more child support based on available data on the custodial mother, we estimate an OLS equation for the entire sample in which the ability to pay more is the dependent variable and the characteristics of the custodial mother are the independent variables. We actually estimate six equations using the three different measures of ability to pay derived from the three normative standards, and separate estimates for whites and nonwhites.[17]

The results of this analysis are shown in Table 5. While the analysis itself is relatively straightforward, interpretation is complicated by the nature of the data used in estimating the equations. The dependent variable is the difference between the absent fathers' ability to

Table 5

Targeting Absent Fathers Based on the Characteristics of the Custodial Mother--
Dependent Variable is Ability to Pay More Child Support ($ per year)--
Full Sample: N = 1,084 for Nonwhites; N = 1,715 for Whites

Independent Variables (Custodial Mother)	N.Y. Community Council Guidelines Whites		Wisconsin DEA Guidelines Whites		Wisconsin Percent of Income Standard Whites	
	Coef.	S.E.	Coef.	S.E.	Coef.	S.E.
Age (in years)	69.49	38.21	210.0	33.37	272.0	28.44
Age squared	-.7884	.5560	-2.740	.4856	-3.576	.4139
Education dummies:						
< than 9 years	-645.7	207.1	-270.2	180.9	-443.2	154.2
9-11	-63.67	90.76	192.1	79.28	145.8	67.57
> than 12 years	-363.3	130.5	-184.5	114.0	-360.1	97.12
Never married	-323.2	115.4	262.3	100.8	35.71	85.94
No. of children dummies						
two	3.929	104.1	583.4	90.93	432.0	77.50
three or more	-132.4	116.9	1465.0	102.1	848.3	87.03
Working dummies						
part-time	125.3	172.8	174.6	151.0	101.7	128.6
full-time	-149.3	104.5	-64.81	91.28	45.47	77.80
Dummy for living in a city	630.8	80.55	181.5	70.36	273.6	59.96
Constant	-873.8	621.6	-2172.0	543.0	-3179.0	462.8
	R^2 = .059, F = 9.79, d.f. = 11; 1703		R^2 = .222, F = 43.96, d.f. = 11, 1703		R^2 = .227, F = 45.51, d.f. = 11; 1703	

(table continues)

Table 5 (cont.)

Targeting Absent Fathers Based on the Characteristics of the Custodial Mother--
Dependent Variable is Ability to Pay More Child Support ($ per year)--
Full Sample: N = 1,084 for Nonwhites; N = 1,715 for Whites

Independent Variables (Custodial Mother)	N.Y. Community Council Guidelines Nonwhites		Wisconsin DEA Guidelines Nonwhites		Wisconsin Percent of Income Standard Nonwhites	
	Coef.	S.E.	Coef.	S.E.	Coef.	S.E.
Age (in years)	-40.69	25.14	119.1	40.04	116.7	22.84
Age squared	.9517	.3666	-1.130	.5839	-1.527	.3330
Education dummies:						
< than 9 years	-176.8	107.2	526.8	170.7	17.02	97.38
9-11	11.70	60.88	174.8	96.95	152.3	55.30
> than 12 years	1216.0	95.48	361.6	152.1	770.4	86.73
Never married	-30.41	60.43	-32.09	96.24	-37.45	54.89
No. of children dummies						
two	-38.48	72.70	318.1	115.8	111.8	66.04
three or more	-44.09	76.19	969.3	121.3	337.5	69.21
Working dummies						
part-time	-341.3	151.2	637.9	240.8	-909.3	137.4
full-time	-226.4	73.62	396.5	117.2	-342.8	66.87
Dummy for living in a city	567.8	128.4	715.	204.4	1293.0	116.6
Constant	5.364	422.2	212.0	672.4	2842.0	383.5
	R^2 = .184, F = 21.97, d.f. = 11; 1072		R^2 = .249, F = 32.32, d.f. = 11; 1072		R^2 = .408, F = 67.20, d.f. = 11; 1072	

Note: Tests of significance are not appropriate for these equations.

pay and actual payments. Both of these measures are, at least in part, functions of the independent variables by definition. The absent fathers' income is predicted income (a linear function of custodial mothers' attributes) for almost two-thirds of the cases. The normative standards are partially a function of the mothers' incomes and number of children, as are, presumably, support awards which are related to actual payments. In effect, then, the dependent variable is known, a priori, to be a function of the attributes of the custodial mother because of the manner in which it was constructed for this data set.

The fact that ability to pay is known to be a function of some attributes of the custodial mother by definition (i.e., the normative standard applied) is not considered problematic, since these variables can be identified and the equations still allow us to examine three key issues: (1) the actual quantitative impact of the independent variables given a particular AFDC population; (2) differences between the various normative standards and the relative importance of the different custodial mother characteristics; and (3) the utility of other characteristics for predicting ability to pay more when holding constant the normative standard attributes.

The need to use predicted income for such a large percentage of cases does contaminate this analysis. We know of no way to eliminate this problem other than possible procedures for reducing missing data. Normal tests of statistical significance are inappropriate in this instance.

To test the impact of use of the predicted income on the results of Table 5, we repeated the analysis, restricting the samples to cases with actual income data. These results are shown in Table 6. As one would

Table 6

Targeting Absent Fathers Based on the Characteristics of the Custodial Mother--
Dependent Variable is Ability to Pay More Child Support ($ per year)--
Restricted Sample: N = 244 for Nonwhites; N = 699 for Whites

Independent Variables (Custodial Mother)	New York Community Council Guidelines Whites		Wisconsin DEA Guidelines Whites		Wisconsin Percent of Income Standard Whites	
	Coef.	S.E.	Coef.	S.E.	Coef.	S.E.
Age (in years)	142.1	92.87	213.4**	70.96	249.2***	67.30
Age squared	-1.754	1.355	-2.808**	1.035	-3.320***	.9820
Education dummies:						
< than 9 years	-945.1*	448.7	-413.5	342.8	-626.6*	325.1
9-11	9.380	212.8	91.35	162.6	68.45	154.2
> than 12 years	-463.0	293.3	-226.7	224.1	-437.8*	212.6
Never married	-69.23	299.5	94.57	228.9	34.54	217.1
No. of children dummies						
two	69.39	236.5	692.0***	180.7	558.8***	171.4
three or more	-.9222	271.6	1514.0***	207.6	894.0***	196.8
Working dummies						
part-time	-34.08	366.2	165.7	279.8	77.52	265.3
full-time	-351.8	232.6	-54.20	177.7	8.980	168.5
Dummy for living in a city	494.0**	186.3	94.31	142.3	226.5	135.0
Constant	-1583.0	1486.0	-2512.0	1135.0	-2926.0	1077.0
	R^2 = .031, F = 1.98, d.f. = 11; 687		R^2 = .157, F = 11.62, d.f. = 11; 687		R^2 = .117, F = 8.26, d.f. = 11; 687	

(table continues)

Table 6 (cont.)

Targeting Absent Fathers Based on the Characteristics of the Custodial Mother--
Dependent Variable is Ability to Pay More Child Support ($ per year)--
Restricted Sample: N = 244 for Nonwhites; N = 699 for Whites

Independent Variables (Custodial Mother)	New York Community Council Guidelines Nonwhites		Wisconsin DEA Guidelines Nonwhites		Wisconsin Percent of Income Standard Nonwhites	
	Coef.	S.E.	Coef.	S.E.	Coef.	S.E.
Age (in years)	108.4	109.1	139.4	120.5	120.0	92.13
Age squared	-.9863	1.622	-1.248	1.792	-1.052	1.370
Education dummies:						
< than 9 years	-111.2	513.0	188.9	566.6	13.70	433.2
9-11	87.85	245.5	432.4	271.2	248.5	207.3
> than 12 years	931.8**	351.1	734.1	387.8	786.0**	296.5
Never married	31.89	258.1	-94.48	285.2	-44.32	218.0
No. of children dummies						
two	-123.2	294.6	292.9	325.5	288.4	248.8
three or more	-99.84	323.6	672.8	357.4	340.9	273.3
Working dummies						
part-time	-567.6	701.5	-1296.0	774.9	-852.9	592.5
full-time	-625.8*	276.0	-399.3	304.9	-259.1	233.2
Dummy for living in a city	885.0	710.9	520.6	785.3	1102.0	600.4
Constant	-2315.0	1887.0	-2105.0	2084.0	-2218.0	1594.0
	R^2 = .077, F = 1.76, d.f. = 11; 232		R^2 = .139, F = 3.39, d.f. = 11; 232		R^2 = .143, F = 3.53, d.f. = 11; 232	

* $p \leq .05$
** $p \leq .01$
*** $p \leq .001$

expect, with the reduced sample size and elimination of artifical correlations resulting from use of the predicted income values, standard errors of the coefficients are generally increased in Table 6. The basic findings, however, regarding the direction and relative contributions of the independent variables are fairly consistent in the two tables. One exception is the coefficient for the dummy variable indicating living in a city. This was a highly significant predictor of income (see Table 2), and its relationship to ability to pay more child support (ATPM) appears to be largely an artifact of the use of predicted income in Table 5.

The use of separate models for whites and nonwhites in Tables 5 and 6 does not provide a specific coefficient testing the predictive ability of race. It should also be noted that nonwhites have a significantly lower ATPM than whites. Estimates of average ATPM range from $412 to $132 higher for whites than for nonwhites.[18]

Returning to Tables 5 and 6, it appears that, for whites, age and education of the custodial mother are consistently strong predictors of the absent father's ATPM. Age is positively associated with ATPM with a fairly strong nonlinear trend. With respect to education, it should be noted that absent fathers of custodial mothers with less than nine years of education have a low ATPM relative to those with a high school education (omitted category). However, the custodial mother's having a formal education beyond high school is not a good predictor of absent father's high ATPM relative to those with just a high school education.

The differences between the New York and Wisconsin standards in terms of the assumptions each make about the priority of child support obligations is evident in the results of Tables 5 and 6. Number of children

requiring child support is not a significant predictor of ATPM under the N.Y. Community Council Guidelines but is, particularly for whites, under the two Wisconsin standards.

Education is a strong predictor of ATPM for nonwhites. However, the relationship is different from that found for whites. For nonwhites, custodial mother's education beyond high school compared to high school graduates (omitted category) is a good predictor of the absent father's ability to pay more child support.

Giving Priority to Obtaining More Support Orders

In order to measure the effect of getting support orders where none now exist, we must first predict how much these awards would be. Then we must estimate how much of the award would be collected.

To predict how much the award would be if no changes in award procedures were made, we used an equation estimating the award amount for the subsample with awards (N = 1278) in which the independent variables are the attributes of the custodial mother and income of the absent father. The Heckman procedure was again used to test for selection bias (between those with and without orders) and was rejected.[19] The OLS equation predicting average monthly child support owed for cases with support orders is shown in Table 7.

While the absent father's income was not a significant predictor of whether a support order was obtained (see Appendix E), it is a significant predictor of the amount of the award when one exists. If the custodial mother is nonwhite, has never married, and has less than a high school education, the absent father's support order is significantly

Table 7

OLS Equation Estimating Average Monthly Child Support Owed
(N = 1,278)

Independent Variables	Coefficient	S.E.	T-statistic
Gross income of absent father	0.0014	0.0004	3.52
Custodial mother			
Age (in years)	-1.0037	2.3503	0.43
Age squared	-0.0026	0.0344	0.07
Education dummies			
< than 9 years	6.8844	10.9943	0.63
9-11	-11.0906	5.1202	2.12
> than 12 years	3.5144	7.2033	0.49
Never married	-38.0771	6.4323	5.92
Number of children eligible for child support	16.1476	2.2427	7.20
Working dummies			
part-time	-6.3863	9.7300	0.66
full-time	6.3302	5.6634	1.12
Dummy for living in a city	7.8658	5.1311	1.53
Nonwhite	-20.0974	6.1692	3.26
Constant	129.0382	36.9703	

R^2 = .12, F = 14.54, d.f. = 12; 1265.

decreased. As one would expect, more eligible children results in higher award amounts.

For the cases with support orders, a second equation was estimated in which the dependent variable was equal to the amount paid and the independent variables are the order amount owed and the attributes of the custodial mother. Results from this analysis are shown in Table 8. Absent fathers are less likely to pay when the custodial mother is nonwhite and never married even after controlling for the amount of child support owed.

The equation in Table 7 was then used to arrive at a predicted order amount for absent fathers without orders. This value was then used in the equation of Table 8 to arrive at a predicted payment for those without current orders.[20] This provides an estimate of the additional payment resulting from obtaining orders for those currently without child support orders, holding constant the amount of awards and collection efficiency. The average imputed additional annual payments received from the 1521 cases currently without orders is $506 or, extrapolating this to the Wisconsin AFDC population, $19.2 million per year (see Table 9, line B).

Giving Priority to Increasing Support Awards

To estimate the maximum effect of increasing current awards, the normative standards discussed in the section on estimating ability to pay were used to determine how much awards should increase. For each absent father with a support order (assuming no increase in the number of orders), the amount of the existing order was subtracted from the amount

Table 8

OLS Equation Estimating Total Child Support Paid for Year
(N = 1,278)

Independent Variables	Coefficient	S.E.	T-statistic
Average monthly child support owed by absent father	2.870	.2547	11.27
Custodial mother			
Age (in years)	26.16	21.00	1.25
Age squared	-.2688	.3092	.87
Education dummies			
< than 9 years	-113.4	99.93	1.13
9-11 years	-45.12	46.67	.97
> than 12 years	83.84	65.56	1.28
Never married	-135.3	59.34	2.28
Number of children eligible for child support	21.34	20.82	1.03
Working dummies			
part-time	36.06	88.58	.41
full-time	-24.95	51.53	.48
Dummy for living in a city	72.85	46.40	1.57
Nonwhite	-217.4	56.06	3.88
Constant	-280.21	335.83	

R^2 = .176, F = 22.51, d.f. = 12; 1265.

Table 9

Effects on Child Support Collections of Alternative Reforms

Reforms	Increased Annual Collections[a] (in millions of dollars)
A. Collect 100 percent of a universally applied standard	
1. N.Y. Community Council Guidelines	$ 31.6
2. 1982 Wisconsin DEA Guidelines	163.4
3. Wisconsin Percent of Income Guidelines	140.8
B. Get orders at current levels in 100 percent of the cases without increasing either support levels or collection effectiveness	19.2
C. Increase current support order levels without increasing number of awards or collection effectiveness	
1. N.Y. Community Council Guidelines	-16.2
2. 1982 Wisconsin DEA Guidelines	16.8
3. Wisconsin Percent of Income Guidelines	15.7
D. Collect 100% of existing orders without increasing either incidence or levels of support orders	25.6

[a]Total collections for 1980 based on the study sample were calculated to be $19.6 million.

deemed appropriate by the normative standard. In some cases the existing award was actually higher than the award derived from the standard. In these cases, decreases rather than increases were imputed. For those with imputed increases in the amount of the order, the amount of the increase was multiplied by the ratio of the current payments to the current order (assuming no increase in collection effectiveness) to arrive at an estimate of the effect of adopting a particular normative standard. Results from this analysis are shown in Table 9, lines C 1-3).

The nature of the differences between the New York and Wisconsin guidelines are dramatically illustrated in these findings. Applying the Community Council Guidelines to existing orders in Wisconsin would result in a net decrease in annual collections of over $16 million. On the other hand, the Wisconsin standards would yield a net increase of approximately the same amount.

Increasing the Effectiveness of Collections

The maximum potential benefits of increasing the effectiveness of the collection system was the simplest to calculate. It is simply equal to the difference between the sum of all awards and the sum of all payments. Current methods successfully collect about 43 percent of the child support monies owed. If collection effectiveness were to increase to 100 percent of existing awards, annual collections would increase by $25.6 million (see Table 9, line D).

Summary--Impact of Alternative Reforms

What the figures in Table 9 suggest is that any one of the reforms taken alone would result in modest potential savings. If we ignore the N.Y. Guidelines, each of the reforms leads to savings ranging from $16 million to $26 million. Collecting 100 percent of what is now owed would be the single most effective reform.

What is most striking, however, is how much more can be collected if all of these reforms are enacted simultaneously. The effects are more than additive. This can be seen in Table 9 where lines A.2 and A.3 are much greater than the sum of lines B, C, and D. Why is the whole greater than the sum of its parts? The explanation is simple. If collection effectiveness is improved, the gains from increasing orders increase and vice versa. In short, the best strategy is to pursue all three efforts at once. That is, increase the number of awards, increase the level of awards, and increase the proportion of awards collected.

Finally it should be remembered that all the figures and Table 9 represent potential benefits, which will have associated costs if they are to be realized. This is a critical dimension not addressed by the current study to which we must draw the attention of administrators, policymakers, and researchers.

F. Effects on Poverty, Welfare Caseloads, and Welfare Costs

In the previous section we presented the results of (1) obtaining child support orders for cases currently without them; (2) changing current order amounts to correspond to three ability-to-pay standards, and (3) collecting 100 percent of current order amounts. In this section

we examine the effects of these three changes on the incidence of poverty and on welfare caseloads and costs. We also extend this analysis and examine the potential effects of all absent fathers having child support orders set at the levels specified by the ability-to-pay standards.

The interaction of AFDC and child support is critical to this part of the analysis. From the standpoint of the AFDC grant, there is a 100 percent tax rate on child support. In other words, every one-dollar increase in child support results in a one-dollar reduction in the AFDC grant. This dollar for dollar tradeoff continues until the amount of child support equals or exceeds the AFDC grant, at which point the family is no longer eligible for welfare.

One implication of this high tax rate is that increases in child support have no effect on the poverty status of an AFDC family until the child support exceeds the AFDC grant by an amount sufficient to raise the family's income above the poverty line. Similarly, welfare caseloads are not affected until the amount of child support equals or exceeds the AFDC grant.

Welfare costs, on the other hand, are directly affected by changes in child support and are increased or decreased by an amount equal to the change in child support. When child support declines, welfare costs increase, since AFDC must make up the difference and, likewise, when child support increases welfare costs decline because the amount of the child support is subtracted from the AFDC grant. Welfare costs reach zero when the amount of child support equals or exceeds the welfare grant.

In this analysis the changes in child support are examined as follows. For each case the amount of child support is compared to the AFDC grant. If the child support is greater than the grant amount the excess is added to the income of the AFDC family. This increased family income is then compared to the 1980 Social Security Administration poverty level for that family.[21] If the family income is greater than the appropriate poverty line, the family is considered to be removed from poverty.

If the child support is equal to or greater than the AFDC grant, the family is no longer eligible for welfare and the welfare caseload is reduced by one.

Whenever the child support is less than the AFDC grant, welfare costs are reduced (or increased in the few cases where child support is reduced) by an amount equal to the child support. Welfare cost reduction equals the AFDC grant whenever the child support equals or exceeds the AFDC grant amount.

Before examining the effects of the changes in child support it is necessary to review the status of the AFDC families prior to the changes. Based on our sample, the mean annual poverty level is $6448 (s.d. = $1748) while the mean annual income including AFDC + earned income + other unearned income is $5745 (s.d. = $2599). The result is that 82.2 percent of the families are below the official poverty line. It should be noted that this measure of poverty reflects only cash income and does not include in-kind benefits such as food stamps or medical care, which may substantially improve a family's standard of living.

Since our sample is drawn from the AFDC population, the sample caseload equals the sample size of 2375. The mean annual AFDC grant is $4509 (s.d. = $1534), which results in a total welfare cost of $10.7 million for the sample or over $267 million for the population.

As reported earlier, two or more absent fathers were identified or assigned for 380 (16 percent) of the mothers. For these mothers the changes in child support are summed over all of the absent fathers connected to their case. In this way we arrive at the total effect of the changes for each mother and her family.

Table 10 presents the results of this analysis for the three proposed changes. What appears most striking is that the changes have virtually no effect on either the reduction of poverty or welfare caseloads. The maximum reduction in the incidence of poverty is only .51 percent and the reduction in welfare caseloads is only slightly greater. These outcomes are a direct result of the 100 percent tax rate on child support. As reported above, the only time child support can affect either the poverty status of an AFDC family or the AFDC caseload is when the amount of child support is greater than or equal to the grant amount.

Welfare costs, however, are greatly affected by the changes in child support. Obtaining orders for the absent fathers currently without them, applying the two Wisconsin standards, and collecting 100 percent of current orders all produce substantial reductions in welfare costs. However, because many absent fathers are currently paying more than the New York Community Council Guidelines, its application results in a large increase in welfare costs.

Table 10

Poverty and Welfare Effects of Changes in Child Support Administration

	Number of Families Removed from Poverty[a]	Number of Families Removed from AFDC[b]	Welfare Cost Reduction ($ million)
Orders for 100% of cases at current support and collection levels	25 (.05%)	250 (.42%)	$19.2
Set current orders to			
N.Y. Community Council Guidelines	250 (.51%)	800 (1.35%)	-17.6
Wisconsin DEA Guidelines	25 (.05%)	1,125 (1.89%)	16.2
Wisconsin Percent of Income	25 (.05%)	1,200 (2.02%)	14.8
100% Collection of Current Orders	75 (.15%)	1,200 (2.02%)	25.6

[a]Base = 48,825 families in poverty.

[b]Base = 59,375 families on AFDC.

The next step in this analysis is to combine the three proposed changes and examine the effects of getting orders for all absent fathers at levels determined by the ability-to-pay standards. Rather than hold collection at the current levels we assume three different degrees of collection effectiveness. First we assume that 100 percent of the amount due is collected, then 75 percent, and finally 50 percent. The 100 percent assumption represents the maximum possible effect while the 50 percent assumption corresponds more closely to the current collection ratio of 43 percent. Table 11 presents the results of this analysis.

As with the previous analysis, the increases in child support have little effect on either poverty or welfare caseload reduction. Even under the assumption of collecting 100 percent of the standards, the maximum reduction in the number of poor families is less than 2 percent and the maximum reduction of welfare caseloads is less than 15 percent. Under the more realistic but still optimistic assumption of collecting 75 percent of the amount due, poverty reduction falls to less than 1 percent and welfare caseloads are reduced only 6 percent at best. Using the 50 percent assumption, which comes closer to reflecting current collection ratios, poverty reduction is almost nonexistent and caseloads are reduced by less than 3 percent.

There is a dramatic reduction in welfare costs under the 100 percent assumption. Collecting 100 percent of the ATPM reduces welfare costs by over $26 million for the New York standard and over $153 million for the Wisconsin DEA Guidelines. The latter figure represents a 57.3 percent savings over the current costs of AFDC. These are maximum and hence not very realistic estimates.

Table 11

Poverty and Welfare Effects of Collection of Absent Fathers' ATPM

	No. of Families Removed from Poverty[a]	No. of Families Removed from AFDC[b]	Welfare Cost Reduction ($ millions)
		100% Collected	
N.Y. Community Council Guidelines	950 (1.95%)	2,925 (4.93%)	26.5
Wisconsin DEA Guidelines	700 (1.43%)	8,475 (14.27%)	153.3
Wisconsin Percent of Income	750 (1.54%)	7,275 (12.15%)	132.3
		75% Collected	
N.Y. Community Council Guidelines	350 (.72%)	1,550 (2.61%)	21.7
Wisconsin DEA Guidelines	225 (.46%)	3,650 (6.15%)	118.4
Wisconsin Percent of Income	150 (.30%)	3,425 (5.77%)	102.5
		50% Collected	
N.Y. Community Council Guidelines	50 (.10%)	500 (.84%)	15.2
Wisconsin DEA Guidelines	75 (.15%)	1,575 (2.65%)	80.8
Wisconsin Percent of Income	75 (.15%)	1,475 (2.48%)	69.6

[a]Base = 48,825 families in poverty.

[b]Base = 59,375 families on AFDC.

Even the 50 percent collection rule results in substantial savings, however, ranging from $15 million to over $80 million. The savings from the Wisconsin DEA Guidelines represents a 30 percent reduction in welfare costs.

In the above analysis we assume that families will not go off AFDC until the child support is greater than or equal to the welfare grant. Since some families may choose to voluntarily go off welfare if the amount they gain from AFDC is small, we repeat the above analysis under the assumption that families will leave the AFDC rolls if their average monthly net benefit is less than $25. The primary effect of this assumption concerns welfare costs and caseloads. Table 12 presents the number of cases which would be removed from AFDC as a result of this assumption and the equivalent reduction in welfare costs.

With collection of 100 percent of the amount due, removing families from AFDC if their monthly net benefit is less than $25 results in an average (over the three standards) about 3 percent more cases being removed from AFDC and an average increase in welfare savings of $.3 million. Using the more realistic assumption of 75 percent and 50 percent, the extra decline in caseloads is approximately 1 percent and the extra welfare savings is $.1 million. This appears to be a moderate effect for the maximum collection effectiveness of 100 percent and only a minimal effect for the other two collection assumptions.

Summary

The most salient finding of this section is that as long as the marginal tax rate is retained, increases in child support collection will have very little effect on the incidence of poverty for AFDC families.

Table 12

Reduction in AFDC Cases and Welfare Costs
from $25 per Month Rule

	No. of Cases Removed from AFDC		Welfare Cost Reduction ($ millions)
		100% Collected	
N.Y. Community Council Guidelines	3,650	(6.15%)	$ 26.9
Wisconsin DEA Guidelines	10,750	(18.11%)	153.7
Wisconsin Percent of Income	9,100	(15.33%)	132.7
		75% Collected	
N.Y. Community Council Guidelines	2,325	(3.92%)	21.8
Wisconsin DEA Guidelines	4,900	(8.25%)	119.3
Wisconsin Percent of Income	4,650	(7.83%)	102.7
		50% Collected	
N.Y. Community Council Guidelines	850	(1.43%)	15.3
Wisconsin DEA Guidelines	2,300	(3.87%)	81.0
Wisconsin Percent of Income	2,250	(3.79%)	69.7

Even collecting 100 percent of the amount due from all absent fathers (i.e., maximum possible effect) results in less than a 2 percent reduction in the poverty rate. AFDC caseload reduction does somewhat better, with reductions based on the Wisconsin Percent of Income Standard ranging up to a maximum of 18 percent (Table 12, line 2), but with a more realistic reduction closer to 6 percent (Table 11, line 5). Clearly the most significant impact of increased collections is on welfare costs. Obtaining orders for all absent fathers while holding order amounts and collection effectiveness at current levels results in a welfare savings of over $19 million. Increasing the amounts of these orders to the Wisconsin DEA standard and collecting 75 percent of what is due increases the savings to $118 million. The effect of obtaining more child support from AFDC absent fathers is principally to reduce welfare costs rather than to reduce poverty for the AFDC families.

DISCUSSION AND POLICY RECOMMENDATIONS

We would urge extreme caution in generalizing the results of this study to other states, which may have different income structures and AFDC populations. On the other hand, a major goal of this project was to develop a procedure that other states could use to determine absent fathers' ability to pay more child support and identify methods for collecting additional support if available. With respect to that goal, we feel we have been quite successful.

The need for some of the complex procedures employed here (particularly the Heckman procedure to correct for selection bias) is

created by problems arising fromm missing data. Thus better data collection and management could simplify this process considerably. For our sample we estimate conservatively that 13 percent of the absent fathers have not been identified. More important, as a cause of missing data, we were able to obtain social security numbers for only 65 percent of the absent fathers identified. We would strongly recommend that any state attempting to replicate this study first make a concerted effort to obtain social security numbers for all identified absent fathers.

Difficulties in data collection in this project point to the need for improved information transmittal between the three major agencies involved in child support: IV-D, welfare offices, and the county clerk of courts. Although staff and administrators in these different agencies view the client from different perspectives, creating some conflicts, we believe the existing problems can be addressed primarily as a data management problem which can be remedied largely through better (probably electronic) data processing approaches. Compatibility and interfacing of data systems are critical for effective research and management.

The final major data collection issue addressed in this study involves the costs and benefits of obtaining income data for the absent parent from state and federal tax returns. From our experience we would suggest use of state tax records as a primary data source in states which have income taxes and computerized income tax records and where cooperative arrangements exist or can be negotiated between state income maintenance and revenue offices. Federal parent locator and the IRS were generally found to be slower and more costly and provided less information than state tax records.

Turning to the substantive findings, this study addresses three major objectives: First it estimates absent fathers' ability to pay more child support. Second it estimates the potential increases in child support that could result from (a) the state giving priority to pursuing particular kinds of absent fathers based on characteristics of the custodial mother; (b) increasing the number of child support awards; and (c) increasing the amount of awards and/or increasing collection effectiveness. Finally this study predicts the effect of increases in child support collection on the income and poverty status of children and on welfare costs and caseloads.

Our first finding was that in Wisconsin absent fathers are able to pay more child support. The numbers are substantial, ranging from $32 million to $163 million annually depending on the normative standard used to define ability to pay. These findings should be tempered by two considerations. First of all, they represent potential increased collections. It would presumably involve some costs (administrative, increased workers, time, etc.) to realize these benefits. Some methods, like wage assignments, might realize a high percentage of benefits with low administrative costs. Costs have not been considered in arriving at our estimates and need to be incorporated in any discussion of administrative or policy changes.

A second consideration in viewing our estimates of the absent fathers' ability to pay more child support involves the need to use predicted income for almost two-thirds of our sample of absent fathers. While there is considerable face validity to the arguments for why one would expect lower incomes for the cases with missing data, our predicted

income figures are relatively high when compared to actual income cases ($10,683 vs. $11,182 respectively) and the Heckman procedure does not indicate a significant selection bias problem. It is possible that the Heckman procedure as modeled in our analysis is not adequately sensitive to selection bias. This is another argument for attempting to obtain more social security numbers to reduce the problems associated with missing data.

It appears that targeting of absent fathers with high ability to pay more child support is possible through the type of modeling equation shown in Tables 5 and 6. For our sample, whites have a significantly higher ability to pay more child support than nonwhites. We recommend modeling each separately. Age and education of the custodial mother were found to be the strongest predictors of the absent father's ability to pay more child support for whites. For nonwhites, education is the best single predictor of ability to pay more. The equations developed here could be used to predict an absent fathers ability to pay more child support by multiplying the known values for a particular custodial mother by the appropriate coefficient from Table 5 and summing these products plus the constant.

This study also considered the impact of a number of possible reforms to the existing child support system in Wisconsin. The potential increased annual collections ($19.2 million) resulting if orders were obtained at existing levels in 100 percent of the cases coupled with the finding that income of the absent father is not a predictor of whether or not an order was obtained, together make a strong argument for reform in this area. Less than half of the absent fathers in our sample had support orders. Less than half of the annual amount owed in these orders

was actually collected. Of the three reforms considered in this study, collection of 100 percent of the existing orders had the highest potential increase in annual collections ($25.6 million). It would appear, then, that better enforcement of existing standards would be a major improvement. Again, however, costs and feasibility of realizing these potential gains must be considered. The most important finding, however, is that while the gains are modest from (1) increasing only the number of child support orders; or (2) increasing only the level of awards; or (3) increasing only the proportion of awards that are paid, the gains from doing all three simultaneously are very large.

Although the increased child support collections which could result from significant reform of the system represent major reductions in AFDC costs, by themselves, they will have little or no effect on welfare caseloads and poverty status of the children. The collections while substantial in aggregate, are simply not sufficient to both replace the AFDC grant and raise the overall income for individual families. Because of the 100 percent tax rate on unearned income in AFDC, the increased collections are almost entirely used to replace AFDC dollars. A lower tax rate, which allows the custodial family to realize more of the benefits of increased collections, may be desirable because it would create an incentive for the mother's cooperation in identifying and locating the absent father. An alternative method of allowing AFDC children and custodial parents to share in the gains is to pay the child a benefit equal to either what the absent parent pays or a minimum, whichever is higher. The minimum benefit, when combined with a bit of earnings, could lift a substantial part of the AFDC population out of poverty and remove them from welfare.

NOTES

[1]In our proposal we suggested two possible methods for generating our AFDC sample: Basic Needs Study and the Quality Control Sample. Basic Needs is an ongoing panel study of Wisconsin families, which includes approximately 300 AFDC families. While we believed the Basic Needs Study provided a rich data source, the AFDC subsample in Basic Needs was simply too small for our needs. Another group of researchers in IRP, however, will be studying several child support related issues utilizing this data base.

We had hoped the 1982 QC sample would provide a useful sampling procedure as well as a mechanism for carrying out an interview with the custodial parent. The sample size would have been something of a constraint here as well. However, it would not have been nearly as severe, since we anticipated using 6 months of QC cases totalling approximately 1200 cases. The interview with the custodial parent would have provided descriptive data on the absent parent, including an estimate of the absent parent's income which was to be compared with the actual income. As we proceeded, the need for this interview became less clear. The estimated income figure obtained from the custodial parent, even if found to be reliable for this study, could easily be manipulated if it were to be used for administrative purposes. Furthermore, IRP has already developed a method of predicting an absent father's income using attributes of the custodial parent. This procedure uses the assumption that the custodial parent's characteristics are highly correlated with the absent parent's characteristics and can serve as proxies for them.

A further constraint on the use of the QC sample involved the availability of state and federal tax return data. If we were to draw our sample for 1982 and obtain 1982 data on the absent parent and the payment record for 1982, we would need 1982 tax returns for the absent parent. These would not be available until late 1983, and our study was to be completed by January 1983. The availability of tax data, in fact, dictated that our sample be drawn for 1980. Tax data are discussed further in the section on data collection.

[2]Alice Robbin and Doris Slesinger, "Demographic Characteristics of Wisconsin's Economic Assistance Recipients," Data and Program Library Service, University of Wisconsin-Madison, 1981.

[3]Seven counties did not have their AFDC cases fully loaded on the CRN in September 1980. Of these, Langlade, Lincoln, Oneida, and Vernon counties were partially loaded and do appear in our sample. Florence, Jackson, and Trempealeau had no cases on the CRN.

[4]The total 4 percent AFDC sample breaks down into the following types of households: 2087 female-headed households (no spouse); 710 two-parent households; 39 male-headed households; and 29 maternity cases.

[5]The majority of these cases (182) involved families in which the father was present but incapacitated. Another 59 cases involved families in which the father was absent because of incapacitation. Exclusion of cases in which the father was incarcerated may not have been justified, since some of these fathers may have been able to pay support. However, only eight such cases occurred in our sample.

[6]James J. Heckman, "Sample Selection Bias as a Specification Error," Econometrica, 47:1 (January 1979), 153-161.

[7]There was some concern that this figure may overestimate absent fathers' income because it ignores certain additional information which was available for some absent fathers. For 130 absent fathers with valid social security numbers, there were no 1980 Social Security Administration (SSA) addresses, indicating that there were no SSA wages paid in 1980. (SSA data is obtained from employers.) One might argue that these cases should be assigned zero income rather than some imputed amounts based on the prediction equation.

For another 71 cases, the SSA address for 1980 was found, indicating some earnings in 1980. However, no IRS tax return could be found for these cases for 1980. This would suggest that earnings for this group were not high enough for the absent father to be required to file with IRS ($3300 for 1980; $400 if self-employed). Again the imputed value for these cases will generally be higher than that implied by the information from SSA.

Assigning these lower values would be an extremely conservative estimate, since it would assume that all income is reported. In reality, we found that imposing this assumption has little effect on our income estimates. The average income for the entire sample using actual income for available cases (943), assigned income for cases with the additional SSA data (201), and predicted income for the remainder (1655) was found to be $10,104, compared with $10,851 when the imputed value is used to replace the assigned values for the 201 cases. This was felt to justify the use of the imputed values in the remainder of the analysis.

[8]M. Sauber and E. Taittonen, Guide for Determining the Ability of of an Absent Parent to Pay Child Support. Research and Program Planning Information Department, Community Council of Greater New York, 225 Park Avenue South, New York, NY 10003, May 1977.

[9]Division of Economic Assistance, Wisconsin Department of Health and Social Services, Child Support: Guidelines for the Determination of Child Support Obligations. February 1982.

[10]Irwin Garfinkel and Marygold Melli, Child Support: Weaknessess of the Old and Features of a Proposed New System. Volume I. Institute for Research on Poverty, February 1982. Madison, WIs.

[11]In dividing the AFDC children between multiple absent fathers, only "whole" children could be allocated. In some situations this necessitated randomly assigning an "odd" child to one of the fathers.

[12]BLS budgets for a family of 4 (Table 763), Statistical Abstract of the United States, 1982, p. 465.

[13]Sauber and Taittonen, p. 24.

[14]Division of Economic Assistance, Wisconsin Department of Health and Social Services.

[15]Applying The DEAG to our more conservative income estimates yields an average of $2411 (s.d. = $1723).

[16]Applying the Wisconsin Percent of Income Standard to our more conservative income estimates yields an average of $2142 (s.d. = $1435).

[17]Once again we found the separate equations provided a much better fit to the data than a single equation with race dummies.

[18]The range of estimates is dependent upon the standard used and the sample. The highest estimate is for the New York Standard using the restricted sample of cases with actual income data ($412). The lowest is for the Wisconsin DEA Standard ($132). For the New York and Wisconsin standards with the full sample, the respective values are $337 and $150. The Wisconsin Percent of Income Standard yields estimates between these values. The difference between the Community Council and DEA estimates appears to result largely from the former's insensitivity to the number of children (discussed below). Nonwhites have, on average, more children requiring child support, and the DEA Standard, which is more sensitive to number of children in the custodial family in calculating ability to pay, yields higher support obligations for nonwhites than the Community Council Guidelines.

[19]In this instance the procedure was not as clear as in previous applications. The lambda term calculated from the probit analysis of the existence of a support order (see Appendix E) was significant when entered in the second equation estimating the amount of the award. However, the predicted award amounts for the cases with no orders were practially all negative when the Heckman term was included in the prediction equation. This would indicate no award was possible for those without current awards. This is highly unlikely and suggests problems with the Heckman procedure. We believe these problems arise from multicollinearity, introduced by the inclusion of the absent fathers' income as an independent variable. It will be remembered that this is a predicted value for almost two-thirds of the cases and is a function of the other independent variables (custodial mothers' characteristics).

[20]Predicted payments are adjusted if necessary to eliminate negative payments (set equal to zero) and payments greater than amount owed (set equal to amount owed).

[21]Poverty levels in 1979 for various size families were obtained from the Statistical Abstract of the United States, 1981, p. 445. These were then inflated by the annual increase in the Consumer Price Index that occurred between 1979 and 1980. The CPI increase was 13.5 percent (Statistical Abstract of the United States, 1983, pp. 453-454). The resulting poverty levels for female household heads were:

Family Size	Poverty Level $
1	4,108
2	5,405
3	6,384
4	8,377
5	9,864
6	11,172
7+	13,661

Family size, for our analysis was defined as the number in the AFDC group.

APPENDIX A

FORM 1

Study Case # _____ (3-8)

STUDY TO PREDICT ABSENT FATHERS' ABILITY TO PAY MORE CHILD SUPPORT

1. Name of Custodial Mother _____ SSN _____ (9-17)

2. Full Name of Absent Father _____ SSN _____ (18-26)

(If there is more than one Absent Father for this case please note question 8.)

(If the court order is not within your county, please skip to question 9.)

3. Absent Father's Primary Residence for 1980:

a. State of Wisconsin _____ 1. Yes _____ 2. No (27)

b. Same county as custodial mother _____ 1. Yes _____ 2. No (28)

4. Was there a support order during 1980? _____ 1. Yes _____ 2. No (29)

5. Date of order ___ | ___ | ___ (30-35)
Mo. | Day | Year

6. Number of children covered by order _____ (36-37)
(If there were changes in the order during 1980 in terms of amount, number of children covered, etc., please indicate the changes under question 11.)

7. Payment Record for 1980 or Available Portion There of

CHILD SUPPORT			ALIMONY/MAINTENANCE			FAMILY SUPPORT		
1980 Months	Amount Owed	Amount Paid	1980 Months	Amount Owed	Amount Paid	1980 Months	Amount Owed	Amount Paid
Jan			Jan			Jan		
Feb			Feb			Feb		
March			March			March		
April			April			April		
May			May			May		
June			June			June		
July			July			July		
Aug			Aug			Aug		
Sept			Sept			Sept		
Oct			Oct			Oct		
Nov			Nov			Nov		
Dec			Dec			Dec		

(2:9-80) (3:9-80) (4:9-80)

(continued on reverse side)

8. If the case for the custodial mother listed on the front of this form involves more than one absent father, please list their names and SSN's below and complete a separate form for each of them.

   Full name _____ SSN _____

   Full name _____ SSN _____

   Full name _____ SSN _____

9. If the absent father is not under your jurisdiction please indicate the correct county of the court order and return this form to the address below.

   (correct county of jurisdiction) _____

10. Please return all completed forms to:

    Mr. Sherwood Zink
    Bureau of Child Support
    P.O. Box 8913
    Madison, WI 53708

11. Additional Comments:

12. Name of County person completing this form _____

    Phone _____

IV-A Worker Zone # _____

FORM 2

Study Case # _____

STUDY TO PREDICT ABSENT FATHERS' ABILITY
TO PAY MORE CHILD SUPPORT

1. Name of Custodial Mother _____

   SSN _____

2. a. Full Name of Absent Father _____

   b. SSN _____

   c. Court Case Number _____

   d. County of Court Order if other than Milwaukee _____

   (If the children of this custodial mother have more than one absent father, complete an additional block of information for each father.)

3. a. Full Name of Absent Father _____

   b. SSN _____

   c. Court Case Number _____

   d. County of Court Order if other than Milwaukee _____

4. a. Full Name of Absent Father _____

   b. SSN _____

   c. Court Case Number _____

   d. County of Court Order if other than Milwaukee _____

5. Comments

APPENDIX B

Custodial Mother Characteristics
(N = 2,375)

Continuous Variables

	Mean	Standard Deviation
1. Age	29.08	7.79
2. Education	11.23	1.88
3. Hours worked per week	7.7	14.65
4. Duration on AFDC this cycle (months)	30.81	38.72
5. Number of children eligible for child support	1.91	1.10
6. Earned income (monthly in $)	91.58	228.46
7. Other unearned income (monthly in $)	11.50	56.65
8. Value of total assets ($)	66.78	173.98

Dummy Variables

	Number of Cases
9. Education	
<9	141
9-11	907
12	1,061
>12	266
10. Race	
White	1,562
Black	659
Hispanic	39
Other	115

11. Marital status	
Married	358
Separated	550
Divorced	640
Never married	796
Other	31
12. Number of children	
one	953
two	713
three or more	709
13. Mother retarded or incapacitated	
Yes	90
No	2,285
14. School status	
Not in school	2,203
Part-time	64
Full-time	108
15 Work status	
Not working	1,807
Part-time	120
Full-time	448
16. Lives in city	
Yes	1,655
No	720

APPENDIX C

Results of Heckman Procedure--Testing for Selectivity Bias in Equation Estimating Income

Independent Variables (Custodial Mother)	Nonwhites (N = 244)			Whites (N = 699)		
	Coef.	S.E.	T-statistic	Coef.	S.E.	T-Statistic
Age (in years)	1085.0	626.9	1.73	1405.0	359.0	3.91
Age squared	-11.65	8.276	1.33	-18.31	5.038	3.63
Education dummies						
< than 9 years	294.6	291.8	1.01	-1951.0	1499.0	1.30
9-11	782.7	1097.0	0.71	520.1	887.6	1.30
> than 12 years	4202.0	1483.0	2.83	-1481.0	968.5	1.53
Never married	110.8	1073.0	0.10	-1145.0	2575.0	0.44
Number of children dummies						
two	-1345.0	1285.0	1.05	-311.2	876.6	0.36
three or more	-1438.0	1493.0	0.96	-68.95	892.9	0.08
Working dummies						
part-time	-4510.0	2790.0	1.62	409.2	1295.0	0.32
full-time	-25.42.0	1749.0	1.45	-321.1	819.9	0.39
Dummy for living in a city	6167.0	5436.0	1.13	1326.0	724.7	1.83
Lambda	-486.9	894.1	0.54	-50.95	2308.0	0.02
Constant	-12,680.0	7390.0		-13,140.0	5003.0	

APPENDIX D

Estimating Number of New Dependents

Choice of the multiple logit was dictated by the distribution of the dependent variable in the subsample of cases with state tax returns.

Number of New Dependents	Frequency	Percentage
0	255	39.6%
1	133	20.7
2	100	15.5
3	73	11.4
4	40	6.2
5 or more	42	6.6

The multiple logit, in effect, treats the dependent variable as a categorical rather than continuous variable. Separate logit equations were run for four dependent variables indicating the number of new dependents (1 or more, 2 or more, 3 or more, 4 or more, and 5 or more). The dependent variables take on the value one if the condition applies, zero if not. The independent variables are the attributes of the custodial mother (identical to the income equations).

The predicted logit values for the missing data cases are used to calculate the exact probabilities of falling into each group by use of the following formula:

$$P_i = \frac{e^{\hat{L}_i}}{1 + e^{\hat{L}_i}}$$

where i = dependent variable categories = 1 or more, 2 or more ... 5 or more new dependents.

P_i = probability of being in the i^{th} category.

$\hat{L}_i$ = predicted logit value = $b_o + \underline{b}_i X_i$.

The probabilities from above are used to calculate the probabilities of having 0, 1, 2, 3, 4, or 5 new dependents* from the following equations:

$$P(0) = 1 - P(1 \text{ or more})$$

$$P(1) = P(1 \text{ or more}) - P(2 \text{ or more})$$

$$P(2) = P(2 \text{ or more}) - P(3 \text{ or more})$$

$$P(3) = P(3 \text{ or more}) - P(4 \text{ or more})$$

$$P(4) = P(4 \text{ or more}) - P(5 \text{ or more})$$

$$P(5) = P(5 \text{ or more})$$

Finally, the number of new dependents is calculated to be

$$\text{Number New Dependents} = 0*P(0) + 1*P(1) + 2*P(2) + 3*P(3) + 4*P(4) + 5*P(5).$$

---

*No one had more than 5 new dependents.

APPENDIX E

Predicting a Support Order

The first step in the analysis of the potential returns resulting from giving priority to obtaining more support orders was to estimate a probit equation predicting for the whole sample whether there is an award or not. The primary function of this analysis was to derive the Heckman term to correct for selection bias in the second equation predicting the amount of the award for the subsample having orders. However, the analysis itself is of substantive interest to those concerned with the dynamics involved in obtaining support orders. For this reason the results of the probit analysis are presented in Table E-1.

The most startling finding in this table concerns the insignificant coefficient for absent father's gross income. The absent father's income is not a significant predictor of whether or not a support order has been obtained! If the mother is nonwhite, out of work, has less than a high school education, and has never married, there is less likelihood that a support order was obtained from the father. Having more chidren increases the likelihood of there being a support order.

Table E-1

Probit Analysis--Dependent Variable Equals One if a Support Order Has Been Obtained (N = 2,799)

Independent Variables	Coefficient	S.E.	T-Statistic
Absent father gross income	$.5297 \times 10^{-5}$	$.5327 \times 10^{-5}$	0.99
Custodial mother			
Age (in years)	-.0016	.0236	0.07
Age squared	-.0005	.0003	0.13
Education dummies			
> than 9 years	-.1877	.1116	1.68
9-11	-.1589	.0551	2.89
< than 12 years	.0007	.0816	0.01
Never married	-.2285	.0621	3.68
Number of children eligible for child support	.0659	.0238	2.78
Working dummies			
part-time	.1717	.1145	1.50
full-time	.1579	.0644	2.45
Dummy for living in a city	.0086	.0593	0.14
Nonwhite	-.4700	.0614	7.66
Constant	.0707	.3723	
	$\chi^2 = 173$; d.f. = 12		