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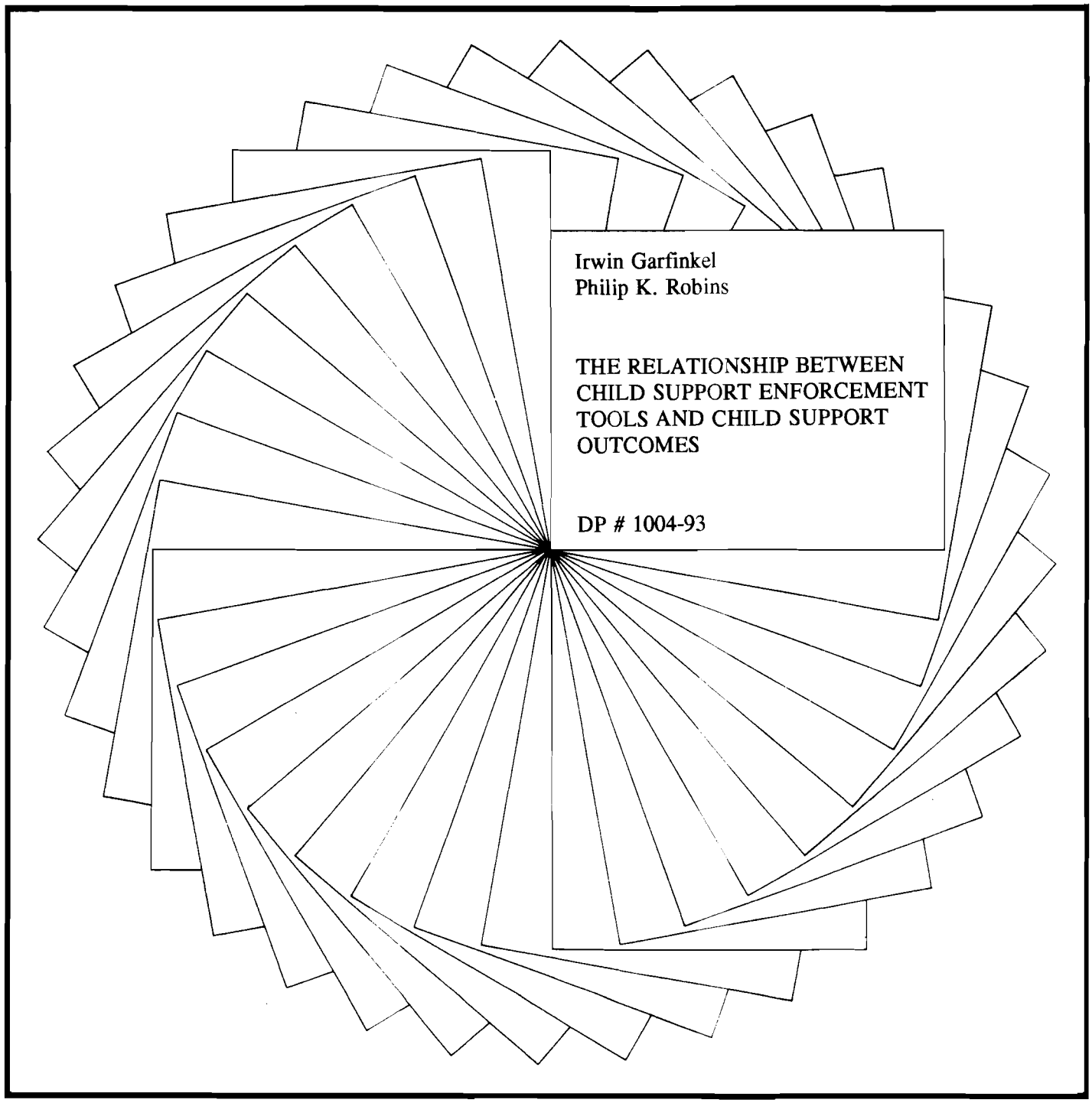

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THE RELATIONSHIP BETWEEN CHILD SUPPORT ENFORCEMENT TOOLS AND CHILD SUPPORT OUTCOMES

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The Relationship between Child Support Enforcement Tools and Child Support Outcomes

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Abstract

The 1984 Child Support Amendments and the 1988 Family Support Act increased the ability of state child support offices to enforce child support obligations. The authors estimate the impact of several provisions of these two pieces of legislation on child support payments and awards. They find that withholding child support payments from the wages of noncustodial parents, allowing paternity to be established until a child's eighteenth birthday, and advertising enforcement services lead to more money collected in child support, more (and higher) child support awards, and higher collection rates. Requiring child support to be paid through a third party and generous spending by states on their enforcement programs also positively affect payments and awards. Data are from the Child Support Supplement of the Current Population Survey.

The Relationship between Child Support Enforcement Tools and Child Support Outcomes

I. INTRODUCTION

Since 1984, the child support enforcement system in the United States has undergone dramatic changes. Two landmark pieces of federal legislation have been enacted that place major responsibilities on states to improve their child support enforcement performance. The first is the Child Support Amendments of 1984. Among numerous other provisions, the 1984 amendments required states to develop non-binding numerical guidelines for the establishment of child support awards and required that a system of wage withholding be instituted when child support obligations were not being met on a timely basis. The second piece of legislation is the Family Support Act (FSA) of 1988. The FSA goes beyond the 1984 amendments by making the guidelines presumptive (i.e., they must be followed unless a written justification is made that they are inappropriate) and by requiring that a system of universal and immediate wage withholding for all new child support cases be put in place by 1994.

Despite such sweeping reforms, there has been little formal evaluation of the potential impacts of these legislative changes. A study to evaluate the 1984 amendments was conducted by Mathematica Policy Research (Gordon et al., 1991); it focused mainly on the implementation of the provisions with little attention being devoted to their potential impacts on child support payment and award levels. But the results of this study may now be largely irrelevant, because many of the provisions of the 1984 amendments it considered have been superseded by the stronger provisions of the Family Support Act.

Although child support enforcement policies have been crystallized in these two pieces of legislation, the system has actually been an evolving one since the early 1970s. Many of the provisions in the 1984 and 1988 laws had been implemented earlier in many of the states. For

example, as of the end of 1987, five states (Massachusetts, Minnesota, Ohio, Texas, and Wisconsin) had instituted a system of immediate withholding and four other states (Arizona, Hawaii, Illinois, and Virginia) were about to pass similar legislation. This was all occurring prior to the 1988 Family Support Act, which formally required such a system. As another example, many states (such as Delaware, Maine, and Virginia) had been using guidelines to set child support awards well before the 1984 Child Support Amendments required states to develop such guidelines.

Evaluating the impacts of child support enforcement policies is a complex undertaking and can be thought of as encompassing three interrelated steps. The first step consists of determining the degree to which various policies are being successfully implemented at the state level and identifying which state practices appear to be most successful in achieving the objectives of the legislation. The second step involves attempting to determine the impacts of such policies, once implemented, on major child support outcomes, such as child support payment and award levels. Assuming that such impacts exist and are positive, the third step is to determine how increased child support payments and awards further influence other aspects of individual behavior, such as parent-child interactions, parent-parent interactions, labor supply and the welfare behavior of parents, and the school performance and educational attainment of children. The purpose of this paper is to attempt to provide some evidence on the second of these steps--namely, the impacts of enforcement policies on four child support outcomes: the amount of child support collected in a given year, whether an award is obtained, the amount of an award, and the rate at which support is collected.

Because of the recency of the 1988 Family Support Act, it is too early to provide a definitive assessment of the impact of many of its provisions; the relevant data are simply not yet available. Instead, this paper will focus mainly on one key provision of the Family Support Act--immediate wage withholding--plus some of the key provisions of the 1984 Child Support Amendments (pertaining to withholding under delinquency, guidelines, medical support, paternity, fees for non-

AFDC families, and publicizing child support services).[1] In addition, two other factors will be investigated: whether child support outcomes are systematically related to the amount of money states spend on administering their child support enforcement programs, and whether state laws provide for payment of child support to an agency (administrative agency, clerk of the court, etc.) rather than directly to the obligee.

The methodological approach taken in this paper is to exploit state and time variation in the implementation of these child support enforcement policies to determine their impacts on child support payments and award levels.[2] The data used to conduct the analysis are the household survey data collected in a child support supplement to the April Current Population Survey that has been merged by the Census Bureau with the economic and demographic data in the March Current Population Survey (the merged March-April Current Population Survey, which will hereafter be referred to as the CSS-CPS). The analysis utilizes data from the first five rounds of the CSS-CPS, administered in March-April 1979, 1982, 1984, 1986, and 1988, and covering the calendar years 1978, 1981, 1983, 1985, and 1987.[3]

The analysis in this paper is largely exploratory. A relatively large number of policies are examined and very crude statistical methods are utilized to determine which seem to be having the most impact. Future research will develop more sophisticated methods of evaluating these policies and will use later versions of the CSS-CPS to determine longer-run effects.

Despite the crudeness of the analysis, a remarkably consistent and sensible pattern seems to emerge from the data. In particular, several policy variables appear to exert a statistically significant effect on the various outcomes examined, and the signs of the effects are for the most part in the expected direction. In particular, our results imply that provisions for wage withholding (particularly immediate wage withholding), paying child support through an agency, regularly publicizing the availability of child support enforcement services, charging non-AFDC families a fee for applying for

child support enforcement services, permitting paternity establishment at any time during the child's minority, and administrative spending by the state child support enforcement programs are all significantly related to the child support outcomes examined. With the exception of the non-AFDC fees variable, all of the estimated effects are positive, suggesting these policies have led to an improvement in the child support situation of American families. The negative effect of charging fees for non-AFDC families is consistent with economic theory and suggests price responsiveness on the part of families needing enforcement services.

The positive effects estimated in this paper adjust for the effects of family economic and demographic characteristics and time. The positive effects are estimated despite the fact that the raw data on child support award and payment levels have exhibited a sizable downward trend over time.[4] Thus, taking advantage of state variation in policy implementation appears to be a fruitful approach to estimating the impacts of child support legislative policies, even when trends over time are negative. Interestingly, the positive policy effects estimated in this paper are not generally sensitive to whether or not the data are adjusted for time trends.

Our methodology has a potential drawback: it could produce estimated effects that are spurious and possibly due to reverse causation. In other words, the states may have enacted a given policy in response to their child support performance rather than the policy directly influencing child support performance. To explore whether this source of bias might be present, we performed a specification test for the policy that seemed to be exerting the largest impact--immediate withholding.[5] The hypothesis of reverse causation was rejected by the data, suggesting a real impact of immediate withholding on the child support outcomes examined.

The remainder of this paper is organized as follows. In Section II, the child support policies analyzed are described. In Section III, the methodology for estimating the impacts of those policies is described, along with the data used to estimate the impacts. In Section IV, the empirical results are

presented. Finally, in Section V, the results are summarized and suggestions are given for future research.

II. CHILD SUPPORT POLICIES

The 1984 Child Support Amendments were far reaching, putting into place a large number of policies aimed at improving the efficiency of the child support enforcement system. Many of those policies had been implemented earlier by several states and many were refined further by the 1988 Family Support Act.

No central data source exists that documents how states have been implementing the various provisions mandated by the 1984 legislation. As part of their contracts with the Office of Child Support Enforcement (OCSE) to evaluate the 1984 Amendments, Mathematica Policy Research (MPR) and Policy Studies, Inc., compiled information on the status of the implementation as of the end of 1987. This information is useful because the survey data we analyze cover the years 1978 through 1987. The data on implementation status were derived from the OCSE Legislative Tracking System's Accomplishment Reports and information compiled by Policy Studies, Inc. They may be highly unreliable but are the only data presently available that describe the implementation status as of that time.

In total, twenty-three policies are described in the data compiled by MPR and Policy Studies, Inc. A detailed description of these policies is available from the authors. All but a few of the policies were mandated by the 1984 Child Support Amendments. Most were in force as of December 1987, but had more often than not been in effect for only a short period of time, although several states had some of the policies implemented prior to the 1984 amendments. Nevertheless, it is important to emphasize that any impacts estimated for these policies as of the end of 1987 are likely

to represent short-run impacts, and can probably be interpreted as lower-bound estimates of the longer-run impacts of these policies (when they become fully implemented in all of the states).

Of the original twenty-three policies, those related to wage withholding under delinquency, immediate wage withholding, medical provisions, guidelines, paternity, fees for non-AFDC families, and publicizing child support enforcement services were selected for the final analysis. The implementation dates for these policies by state are presented in Appendix Table A-1.

In addition to the policy variables related to the provisions of the 1984 Child Support Amendments and the 1988 Family Support Act, two additional policy variables we felt had the potential to exert statistically significant impacts on child support were constructed for the final analysis. These policy variables were the amount states spend per potentially eligible family on administering their child support enforcement programs and the method they use to funnel payments from the obligor to the obligee. These additional policy variables are also presented in Appendix Table A-1. In the next section, we describe the methodology for examining the impact of these policies on various child support outcomes.

III. METHODOLOGY FOR ESTIMATING THE IMPACTS OF CHILD SUPPORT POLICIES

In order to examine the relationship between the child support policies and child support outcomes, we specified a multivariate regression model. The model uses the individual mother as the unit of observation and takes advantage of state and time variation in implementation of these policies as a means of identifying their influence on various child support outcomes.

A. Outcomes Analyzed

Four child support outcome measures were analyzed--whether or not a child support award existed, child support award levels, the ratio of payments received to payments owed (the collection

rate), and the total amount in child support payments received by the mother. Child support payments are the product of the award rate, the award level, and the collection rate. To be effective, child support enforcement must secure awards in most cases, make sure the awards are adequate and updated, and collect most of what is owed. In addition, specific policies directly affect different components of total child support payments. For example, guidelines directly affect award levels and wage withholding directly affects collection rates, but both may indirectly affect award rates by making an award more valuable to custodial parents. Thus it is useful to examine the effects of the policy variables on each of the three components of aggregate child support payments.

Each outcome was first analyzed using the entire sample of mothers potentially eligible for child support. This was done to avoid potential problems of selectivity bias. Thus, in the initial analysis of award levels and the collection rate, mothers without awards were included in the sample. Then, award levels and collection rates were analyzed using only the sample of mothers with child support awards and correcting for selectivity biases associated with such a restricted sample.

B. Data

The data used to estimate the impacts of child support policies were drawn from the Child Support Supplement to the Current Population Survey (CSS-CPS) for the years 1979, 1982, 1984, 1986, and 1988. The CSS-CPS is the most comprehensive data available at the national level on child support outcomes. The strengths and weaknesses of this data set for analyzing child support issues have been well documented in earlier studies (see Robins, 1987, 1992 and the references therein) and will not be repeated here.

The CSS-CPS consists of a sample of mothers with children from an absent parent. The 1988 sample covers their child support situation during the year 1987, the 1986 sample covers their child support situation during the year 1985, and so on. The sample analyzed in this paper includes women 18 years of age and older (the 1988 CSS-CPS also contains a very small number of mothers between

the ages of 14 and 17, but they were excluded from this study). The sample size is 19,220 (3,325 in 1978, 3,979 in 1981, 4,017 in 1983, 3,882 in 1985, and 4,017 in 1987).

The CSS-CPS also contains economic and demographic information about the family. All models estimated in this paper include the following control variables: dummy variables for region of the country (Northeast, Northcentral, West, and South), years of education, race (black and other), marital status (divorced, (re)married, separated, and never married), number of children, age, years since the marital dissolution if the mother was previously married, and a dummy variable indicating whether the dissolution occurred during 1987. All variables refer to the mother--the CSS-CPS does not contain data on the father. The means of the outcome measures and the control variables are presented in Table 1.

C. Construction of Policy Variables

The data in the Appendix were used to construct sixteen policy variables that are hypothesized to influence the four child support outcomes. The definitions of the policy variables used in the empirical analysis are given in Table 2. These are variables for provisions related to wage withholding under delinquency (WITHDEL), immediate wage withholding (IMMWITH), medical support (MEDICAL), numerical guidelines (GUIDE), paternity (PATERN), fees for non-AFDC families (NAFDCFEE), publicizing child support enforcement services (SERVPUB), requiring payment of child support to an agency (MANDPAY), and administrative expenditures by the state child support enforcement program (CSEEXP). For all but two of the policies (MANDPAY and CSEEXP), two separate variables were defined--a binary 1,0 variable indicating whether the state had adopted the policy prior to or during the relevant survey year and a variable measuring months elapsed between the date of implementation of the policy and the end of the survey period (December 1987). For MANDPAY only a binary variable could be constructed because we did not have

TABLE 1

Definitions and Means of Outcome and Control Variables (Pooled 1979, 1982, 1984, 1986, and 1988 CSS-CPS; N=19,220)

	Definition	Sample Mean
Outcome Variables		
CHDSPREC	Amount of child support received	$976.4[a]
DUE	1 if due child support	.501
CHDSPDUE	Amount of child support due	$1,475.8[a]
COLLRATE	Collection rate (amount received/amount due)	.313
Control Variables		
NE	1 if resides in Northeast region	.197
NC	1 if resides in Northcentral region	.239
WEST	1 if resides in West region	.232
SOUTH	1 if resides in South region	.332
BLACK	1 if black	.240
NONBLACK	1 if not black	.76
EDUCATION	Years of education	11.940
DIVORCED	1 if divorced	.349
MARRIED	1 if (re)married	.267
SEPARATED	1 if separated	.157
UNMAR	1 if never married	.227
KIDS	Number of children	1.717
AGE	Age	33.622
PARMAR	1 if married part of survey year	.136
YEARSDIV	Years since marital disruption (if married)	4.521
Y2	1 if survey year is 1981	.172
Y3	1 if survey year is 1983	.173
Y4	1 if survey year is 1985	.167
Y5	1 if survey year is 1987	.173

Source: Child Support Supplement–Current Population Survey.

Note: Horizontal lines in body of table were inserted by the editor for ease of reading.

[a]In 1987 dollars, adjusted using the Consumer Price Index (CPI). The deflators used are .5739 for 1978, .8002 for 1981, .8769 for 1983, and .9474 for 1985.

TABLE 2

Definitions and Means of Child Support Policy Variables (N=19,220)

Policy Variable	Definition	Sample Mean
DWITHDEL TWITHDEL	Withholding under delinquency or withholding provision in child support order and court action not required to initiate withholding	.264 6.201
DIMMWITH TIMMWITH	Immediate wage withholding	.0343 .578
DMEDICAL TMEDICAL	Provision for including medical support as part of an order if medical coverage is available to absent parent	.316 8.480
DGUIDE TGUIDE	Guidelines for child support awards	.242 8.720
DPATERN TPATERN	Statute permitting paternity to be established until child's 18th birthday	.592 30.542
DNAFDCFEE TNAFDCFEE	Application fee for non-AFDC cases	.393 8.906
DSERVPUB TSERVPUB	Provision for regularly publicizing the availability of child support enforcement services	.391 6.692
DMANDPAY	Provision for payment of child support to an agency	.141
CSEEXP	Administrative expenditures for the Child Support Enforcement Program per female-headed family with children in the state	$152.5

Source: For means of binary and time variables, Mathematica Policy Research (MPR) and Policy Studies, Inc. For CSEEXP variable, see "Additional Notes to Table A-1," below.

Note: "D" before the variable name indicates that the variable is measured as a binary (0,1) variable denoting whether the policy had been implemented in the state as of December 1987. "T" before the variable name indicates that the variable is measured as months (as of December 1987) since the policy was implemented in the state. CSEEXP is measured in 1987 dollars, adjusted using the Consumer Price Index. See the Appendix for further details on the definitions and sources of the policy variables.

information on the date of implementation. CSEEXP is defined as real (1987 dollars) administrative expenditures per female-headed family in the state.

All policies were allowed to affect all outcomes. This was done for methodological and practical reasons. In some cases, the policies were only expected to affect child support awards (MEDICAL, GUIDE, and perhaps PATERN), but because in the initial analysis all the observations were used (including the zeros), child support payments are the product of the probability of having an award, the amount of the award conditional on having an award, and the collection rate conditional on having an award. Thus, payments could be potentially related to policy variables that are only expected to affect awards. For award levels, it is theoretically possible that all of the policy variables could exert an impact.[6]

D. Econometric Model

The econometric model was specified as follows:

(1) $C_j = a_0 + a_{1j}X + a_{2j}P_i + e_j,$

where C_j = the jth child support outcome,

X = the control variables,

P = the policy variables for the jth outcome.

Because of the high degree of multicollinearity between the binary and the time policy variables, as well as between each of these and the binary variables for the survey year, six different specifications of the econometric model were estimated. The first specification included only the binary policy variables; the second included the binary policy variables and the binary variables for the survey year; the third included the time policy variables only; the fourth included the time policy variables and the binary variables for the survey year; the fifth included the binary and time policy variables only; and the sixth included the binary and time policy variables and the binary variables for

the survey year. The control variables and the CSEEXP policy variable were included in each specification.[7]

In order to determine the relative importance of each policy measure, all the policy variables were entered into each equation and then removed systematically. This procedure is sometimes called "backward elimination." Specifically, policy variables were removed one at a time with the least significant policy variable being removed first (i.e., the one that had the lowest partial correlation with the dependent variable). A final "best" equation was selected when all of the remaining policy variables were significant at the 15 percent level or lower.[8]

IV. RESULTS

A. Full Sample for All Outcomes

The results of the backward elimination analyses for each of the four child support outcomes are presented in Tables 3 through 6. Table 3 gives the results for the amount of child support received, Table 4 for whether child support is due, Table 5 for the amount of child support due, and Table 6 for the collection rate (amount received/amount due).[9]

For the amount of child support received (Table 3), several policy variables are statistically significant as one reads across the columns of the various model specifications. Only two variables, however, IMMWITH and NAFDCFEE, are statistically significant in all specifications (in either the dummy or time form). The estimated coefficients for IMMWITH are all positive, indicating that this policy is associated with higher child support payments. The estimated coefficients for NAFDCFEE are all negative, indicating that this policy is associated with lower child support payments. The negative coefficients for NAFDCFEE are consistent with economic theory and suggest that families are price sensitive when applying for child support enforcement services.[10]

TABLE 3

Backward Elimination Results for Amount of Child Support Received

Policy Variable	Model Specification: Dummy Only	Dummy and Year	Time Only	Time and Year	Time and Dummy	Time, Dummy, and Year
DWITHDEL	--	--	--	--	--	--
TWITHDEL	--	--	--	--	--	--
DIMMWITH	283.2[a] (89.60)	211.3[b] (92.41)	--	--	243.6[a] (90.80)	197.4[b] (92.73)
TIMMWITH	--	--	9.44[b] (4.75)	8.22[c] (4.91)	--	--
DMEDICAL	--	--	--	--	--	--
TMEDICAL	--	--	--	--	--	--
DGUIDE	--	--	--	--	--	--
TGUIDE	--	--	--	--	--	--
DPATERN	--	73.10[c] (43.79)	--	--	--	82.09[b] (43.99)
TPATERN	--	--	--	0.71[d] (0.47)	--	--
DNAFDCFEE	-70.68[b] (34.22)	-96.22[d] (62.81)	--	--	-156.3[a] (45.78)	--
TNAFDCFEE	--	--	-2.52[b] (1.13)	-2.30[c] (1.26)	--	-1.98[b] (1.21)
DSERVPUB	--	--	--	--	--	--
TSERVPUB	--	--	4.04[b] (1.75)	--	6.00[a] (1.93)	--

(table continues)

TABLE 3, continued

Policy Variable	Model Specification: Dummy Only	Dummy and Year	Time Only	Time and Year	Time and Dummy	Time, Dummy, and Year
DMANDPAY	--	--	--	--	--	--
CSEEXP	.467[d] (.289)	.559[c] (.312)	--	.563[c] (.320)	--	.515[d] (.317)

Source: Authors' calculations based on Child Support Supplement-Current Population Survey. See also "Additional Notes to Table A-1," below.

Notes: Variables are removed in the order of statistical significance, with the least significant being removed first. The criterion used to select the final equation is that all variables remaining in the equation be significant at the 15 percent level or lower. The signs and level of statistical significance are reported for the included variables.

[a]Significant at the 1 percent level.
[b]Significant at the 5 percent level.
[c]Significant at the 10 percent level.
[d]Significant at the 15 percent level.

A few other variables are also statistically significant in various specifications for the payments outcome. In four of the specifications, the results imply that the more states spend on administering their child support enforcement programs, the more parents collect in child support (the effect for CSEEXP). For every dollar spent per female-headed family, approximately 52 cents more in child support is collected, implying that the expenditures are not cost-effective.[11] Evaluated at the means, this effect implies an elasticity of .08, which is not very large.[12]

In three of the specifications, PATERN is significantly positive, suggesting that in states where paternity can be established up until age 18, child support collections are higher. In two of the specifications, SERVPUB is statistically significant, implying that in states that are required to regularly publicize child support enforcement services, child support payments are higher.

As displayed in Table 4, all policy variables but one (GUIDE) are significantly related to the probability of having a child support award. Three variables--PATERN, SERVPUB, and MANDPAY--are statistically significant in every specification. Thus, allowing paternity to be established until age 18, publicizing the availability of child support enforcement services, and requiring payment of child support through an agency all increase the probability of having an award. Furthermore, the effect of publicizing services seems to get stronger over time, as evidenced by the results in the last column where the coefficient of both the binary variable and the time variable (DSERVPUB and TSERVPUB) are significantly positive.

The effect of MEDICAL on the probability of having an award is negative, suggesting that awards are less likely to be given when there is a provision for including medical support as part of a child support order. Additionally, CSEEXP is estimated to positively affect the probability of having an award.

Several variables appear to influence award levels (Table 5). Many of them are the same ones that influence payment levels (IMMWITH, NAFDCFEE, PATERN, SERVPUB, and

TABLE 4

Backward Elimination Results for Whether Child Support is Due

Policy Variable	Model Specification: Dummy Only	Dummy and Year	Time Only	Time and Year	Time and Dummy	Time, Dummy, and Year
DWITHDEL	--	--	--	--	--	--
TWITHDEL	--	--	.000791[a] (.000258)	.000792[a] (.000275)	.000583[b] (.000272)	.000637[b] (.000283)
DIMMWITH	.0447[b] (.0179)	.0319[c] (.0185)	--	--	.0292[d] (.0188)	.0291[d] (.0190)
TIMMWITH	--	--	--	--	--	--
DMEDICAL	--	--	--	--	--	--
TMEDICAL	--	--	-.000385[b] (.000184)	-.00040[b] (.00019)	-.000349[b] (.000180)	-.000338[c] (.000182)
DGUIDE	--	--	--	--	--	--
TGUIDE	--	--	--	--	--	--
DPATERN	.0135[d] (.00827)	.0195[b] (.00878)	--	--	.0142[c] (.00839)	.0206[b] (.00886)
TPATERN	--	--	.00014[d] (.000091)	.00016[c] (.000093)	--	--
DNAFDCFEE	--	--	--	--	-.0226[c] (.0127)	-.0197[d] (.0131)
TNAFDCFEE	--	--	--	--	--	--
DSERVPUB	.0358[a] (.00835)	.0375[b] (.0179)	--	--	.0327[a] (.0133)	.0407[b] (.0191)
TSERVPUB	--	--	.00019[a] (.00034)	.00185[b] (.00085)	.00146[a] (.000426)	.00168[c] (.000868)

(table continues)

TABLE 4, continued

Policy Variable	Model Specification: Dummy Only	Dummy and Year	Time Only	Time and Year	Time and Dummy	Time, Dummy, and Year
DMANDPAY	.0282[a] (.0101)	.0279[a] (.0101)	.0263[a] (.0102)	.0268[a] (.0102)	.0309[a] (.010)	.0310[a] (.010)
CSEEXP	.000097[d] (.0000617)	.000109[c] (.0000634)	--	--	--	--

Source: Authors' calculations based on Child Support Supplement–Current Population Survey. See also "Additional Notes to Table A-1," below.

Notes: Variables are removed in the order of statistical significance, with the least significant being removed first. The criterion used to select the final equation is that all variables remaining in the equation be significant at the 15 percent level or lower. The signs and level of statistical significance are reported for the included variables.

[a]Significant at the 1 percent level.
[b]Significant at the 5 percent level.
[c]Significant at the 10 percent level.
[d]Significant at the 15 percent level.

TABLE 5

Backward Elimination Results for Amount of Child Support Due

Policy Variable	Model Specification: Dummy Only	Dummy and Year	Time Only	Time and Year	Time and Dummy	Time, Dummy, and Year
DWITHDEL	--	--	--	--	--	--
TWITHDEL	--	--	--	--	--	--
DIMMWITH	267.71[b] (108.6)	--	--	--	197.3[c] (110.3)	--
TIMMWITH	--	--	--	--	--	--
DMEDICAL	--	--	--	--	--	--
TMEDICAL	--	--	--	--	--	--
DGUIDE	--	--	--	--	--	--
TGUIDE	--	--	--	--	--	--
DPATERN	--	--	--	--	--	--
TPATERN	--	--	.942[c] (.561)	1.55[a] (.566)	--	1.55[a] (.566)
DNAFDCFEE	-82.60[b] (40.58)	-162.6[b] (75.05)	--	--	-220.7[a] (55.40)	--
TNAFDCFEE	--	--	-4.11[a] (1.47)	-3.74[a] (1.47)	--	-3.74[a] (1.47)
DSERVPUB	--	--	--	--	--	--
TSERVPUB	--	--	6.64[a] (2.25)	--	8.57[a] (2.34)	--

(table continues)

TABLE 5, continued

Policy Variable	Model Specification: Dummy Only	Dummy and Year	Time Only	Time and Year	Time and Dummy	Time, Dummy, and Year
DMANDPAY	150.4[a] (59.40)	141.4[b] (59.11)	157.0[a] (61.03)	132.9[b] (59.25)	154.1[a] (59.39)	132.9[b] (59.25)
CSEEXP	--	--	-.664[c] (.386)	--	--	--

Source: Authors' calculations based on Child Support Supplement-Current Population Survey. See also "Additional Notes to Table A-1," below.

Notes: Variables are removed in the order of statistical significance, with the least significant being removed first. The criterion used to select the final equation is that all variables remaining in the equation be significant at the 15 percent level or lower. The signs and level of statistical significance are reported for the included variables.

[a]Significant at the 1 percent level.
[b]Significant at the 5 percent level.
[c]Significant at the 10 percent level.
[d]Significant at the 15 percent level.

DMANDPAY), but there is one important difference. Although only significant in one of the specifications, CSEEXP is estimated to have a negative effect on award levels (as opposed to a positive effect on payment levels).[13] Thus, it appears that to the extent that administrative expenditures facilitate getting an award, such awards are on average much lower than awards obtained through other means.

The final set of estimates is for the collection rate (Table 6). Once again, all of the policy variables are statistically significant except GUIDE. In the specification with the binary and time variables included, the results for withholding under delinquency imply that initially the collection rate falls and then rises as the system evolves. For the last specification (column 6), the results imply that after about one-third of a year (.0328/.00745) subsequent to implementing the system, the effect of withholding under delinquency on the collection rate is positive.

B. Disentangling the Policy Effects on Child Support Collections

The results presented in Tables 3 through 6 were estimated using all sample observations (N=19,220). Therefore, they combine the effects of the policy variables on both the conditional and the unconditional values of the outcome variables. For example, the results in Table 3 for the amount of child support collections combine the effects of the policy variables on whether there is an award, the amount of the award, and the collection rate, the latter two conditional on having an award.[14] In this section, we use sample selection techniques to attempt to disentangle the effects of the policy variables on these components of child support collections. In addition, we reestimate the probability of having an award using a probit model rather than an OLS model.

The basic relationship defining the components of child support collections may be written as follows:

(2) $E(\text{Collections}) = P(\text{Award})*E(\text{Amount of Award} \mid \text{Award})*E(\text{Collection Rate} \mid \text{Award})$

TABLE 6

Backward Elimination Results for Child Support Collection Rate (Amount Received/Amount Due)

Policy Variable	Model Specification					
	Dummy Only	Dummy and Year	Time Only	Time and Year	Time and Dummy	Time, Dummy, and Year
DWITHDEL	--	-.0239[b] (.0116)	--	--	-.0306[b] (.0126)	-.0328[b] (.0136)
TWITHDEL	--	--	--	--	.000644[c] (.000372)	.000745[b] (.000378)
DIMMWITH	.0527[a] (.0206)	.0517[b] (.0217)	--	--	.0484[b] (.0219)	.0524[b] (.0222)
TIMMWITH	--	--	.00174[d] (.00110)	.00202[c] (.00113)	--	--
DMEDICAL	--	--	--	--	-.0198[c] (.0117)	-.0244[c] (.0130)
TMEDICAL	--	--	--	--	--	--
DGUIDE	--	--	--	--	--	--
TGUIDE	--	--	--	--	--	--
DPATERN	.0250[a] (.00816)	.0251[a] (.0102)	--	--	.0292[a] (.00959)	.0272[a] (.0103)
TPATERN	--	--	--	--	--	--
DNAFDCFEE	--	--	--	--	-.0198[c] (.0117)	--
TNAFDCFEE	--	--	--	--	--	--
DSERVPUB	--	--	--	--	--	--
TSERVPUB	--	--	.00110[a] (.00035)	.00197[b] (.000981)	.00142[a] (.000460)	.00207[b] (.00100)

(table continues)

TABLE 6, continued

Policy Variable	Model Specification: Dummy Only	Dummy and Year	Time Only	Time and Year	Time and Dummy	Time, Dummy, and Year
DMANDPAY	.0235[b] (.0118)	.0269[b] (.0119)	.0192[c] (.0116)	.0195[c] (.0117)	.0284[b] (.0119)	.0284[b] (.0119)
CSEEXP	.000118[c] (.000070)	.000128[c] (.000074)	.000120[c] (.00072)	.000126[c] (.000074)	--	--

Source: Authors' calculations based on Child Support Supplement-Current Population Survey. See also "Additional Notes to Table A-1," below.

Notes: Variables are removed in the order of statistical significance, with the least significant being removed first. The criterion used to select the final equation is that all variables remaining in the equation be significant at the 15 percent level or lower. The signs and level of statistical significance are reported for the included variables.

[a]Significant at the 1 percent level.
[b]Significant at the 5 percent level.
[c]Significant at the 10 percent level.
[d]Significant at the 15 percent level.

The same variables that were significant using the backward elimination procedures on the unconditional outcome (Tables 4, 5, and 6,) are included in each component's equation. The probability of having an award is estimated over the entire sample (N=19,220) using a probit model; the amount of the award conditional on having an award is estimated using a probit-OLS model with sample selection (first-stage probit, second-stage OLS on the selected sample of 9,652 persons with an award); and the collection rate conditional on having an award is estimated using a probit-tobit sample selection model (first-stage probit, second-stage tobit on the selected sample of 9,652 persons with an award).

The results for the various components are presented in Tables 7, 8, and 9. Qualitatively, the results are quite similar to those in Tables 4, 5, and 6. But the coefficients in the conditional regressions are substantially larger than those in the unconditional regressions--usually about twice the size. Several other findings are worth noting.

First, requiring payments to be made through a public agency significantly increases all three components of child support collections. That this variable is not significantly related to aggregate payments, however, is something of a mystery and may reflect a weakness of the backward elimination technique.

Second, publicizing IV-D services seems to influence the probability of having an award; there is also some evidence that it affects the collection rate and, to a lesser extent, award levels for those with an award. Earlier it was seen (Table 3) that publicizing IV-D services only has a significant effect on aggregate collections in two specifications of the model.

Third, withholding appears to be influencing aggregate collections by increasing both the probability of having an award and the collection rate for those with awards, although the positive effect of withholding under delinquency on the conditional collection rate only occurs four to five

(text continues on page 30)

TABLE 7

Probit Results for Whether Child Support is Due

Policy Variable	Model Specification: Dummy Only	Dummy and Year	Time Only	Time and Year	Time and Dummy	Time, Dummy, and Year
DWITHDEL	--	--	--	--	--	--
TWITHDEL	--	--	.0027[a] (.00083)	.0027[a] (.00088)	.0020[b] (.0008)	.0022[b] (.0009)
DIMMWITH	.14[b] (.057)	.097[c] (.058)	--	--	.086 (.060)	.087 (.061)
TIMMWITH	--	--	--	--	--	--
DMEDICAL	--	--	--	--	--	--
TMEDICAL	--	--	-.0012[b] (.00058)	-.0012[b] (.00058)	-.0011[c] (.00057)	-.0011[c] (.00057)
DGUIDE	--	--	--	--	--	--
TGUIDE	--	--	--	--	--	--
DPATERN	.039[d] (.026)	.056[b] (.028)	--	--	.041[d] (.026)	.060[b] (.028)
TPATERN	--	--	.00038 (.00029)	.00043 (.00029)	--	--
DNAFDCFEE	--	--	--	--	-.067[c] (.040)	-.059[d] (.041)
TNAFDCFEE	--	--	--	--	--	--
DSERVPUB	.12[a] (.026)	.12[b] (.056)	--	--	.11[b] (.042)	.13[b] (.060)
TSERVPUB	--	--	.0061[a] (.0011)	.0060[b] (.0027)	.0045[a] (.0013)	.0055[b] (.0027)

(table continues)

TABLE 7, continued

Policy Variable	Model Specification: Dummy Only	Dummy and Year	Time Only	Time and Year	Time and Dummy	Time, Dummy, and Year
DMANDPAY	.089[a]	.088[a]	.084[a]	.086[a]	.097[a]	.097[a]
	(.032)	(.032)	(.032)	(.033)	(.033)	(.033)
CSEEXP	.00032[c]	.00035[c]	--	--	--	--
	(.00019)	(.0002)				

Source: Authors' calculations based on Child Support Supplement-Current Population Survey. See also "Additional Notes to Table A-1," below.

[a]Significant at the 1 percent level.
[b]Significant at the 5 percent level.
[c]Significant at the 10 percent level.
[d]Significant at the 15 percent level.

TABLE 8

OLS Sample Selection Results for the Amount of Child Support Due Conditional on Having an Award

Policy Variable	Model Specification: Dummy Only	Dummy and Year	Time Only	Time and Year	Time and Dummy	Time, Dummy, and Year
DWITHDEL	--	--	--	--	--	--
TWITHDEL	--	--	--	--	--	--
DIMMWITH	272.42[d] (185.7)	--	--	--	278.6 (196.4)	--
TIMMWITH	--	--	--	--	--	--
DMEDICAL	--	--	--	--	--	--
TMEDICAL	--	--	--	--	--	--
DGUIDE	--	--	--	--	--	--
TGUIDE	--	--	--	--	--	--
DPATERN	--	--	--	--	--	--
TPATERN	--	--	1.11 (1.028)	2.28[b] (1.11)	--	2.82[b] (1.11)
DNAFDCFEE	-266.43[a] (83.51)	-312.51[b] (142.3)	--	--	-409.5[a] (101.5)	--
TNAFDCFEE	--	--	-7.39[a] (2.663)	-7.18[b] (2.847)	--	-7.18[b] (2.85)
DSERVPUB	--	--	--	--	--	--
TSERVPUB	--	--	10.866[b] (4.984)	--	14.15[a] (4.96)	--

(table continues)

TABLE 8, continued

Policy Variable	Model Specification: Dummy Only	Dummy and Year	Time Only	Time and Year	Time and Dummy	Time, Dummy, and Year
DMANDPAY	185.15[c] (107.4)	276.09[b] (119.9)	259.41[b] (115.7)	274.52[b] (122.6)	258.7[b] (115.6)	274.5[b] (122.6)
CSEEXP	--	--	-.92 (.71)	--	--	--

Source: Authors' calculations based on Child Support Supplement–Current Population Survey. See also "Additional Notes to Table A-1," below.

[a]Significant at the 1 percent level.
[b]Significant at the 5 percent level.
[c]Significant at the 10 percent level.
[d]Significant at the 15 percent level.

TABLE 9

Tobit Sample Selection Results for the Collection Rate Conditional on Having an Award

Policy Variable	Model Specification: Dummy Only	Dummy and Year	Time Only	Time and Year	Time and Dummy	Time, Dummy, and Year
DWITHDEL	--	-.049[c] (.029)	--	--	-.057[c] (.033)	-.062[c] (.035)
TWITHDEL	--	--	--	--	.0011 (.00095)	.0014 (.00096)
DIMMWITH	.10[b] (.051)	.10[c] (.054)	--	--	.10[c] (.056)	.11[c] (.057)
TIMMWITH	--	--	.0036 (.0028)	.0043 (.0029)	--	--
DMEDICAL	--	--	--	--	-.053[d] (.033)	-.060[c] (.032)
TMEDICAL	--	--	--	--	--	--
DGUIDE	--	--	--	--	--	--
TGUIDE	--	--	--	--	--	--
DPATERN	.058[a] (.020)	.058[b] (.023)	--	--	.076[a] (.023)	.068[a] (.024)
TPATERN	--	--	--	--	--	--
DNAFDCFEE	--	--	--	--	-.0024 (.030)	--
TNAFDCFEE	--	--	--	--	--	--
DSERVPUB	--	--	--	--	--	--
TSERVPUB	--	--	.0021[b] (.00084)	.0039[b] (.0019)	.0032[a] (.0012)	.0048[b] (.0021)

(table continues)

TABLE 9, continued

Policy Variable	Model Specification: Dummy Only	Dummy and Year	Time Only	Time and Year	Time and Dummy	Time, Dummy, and Year
DMANDPAY	.051[c]	.058[b]	.038	.040[d]	.070[b]	.069[b]
	(.027)	(.028)	(.027)	(.027)	(.028)	(.029)
CSEEXP	.00031[c]	.00031[c]	.00034[c]	.00033[c]	--	--
	(.00017)	(.00018)	(.00018)	(.00018)		

Source: Authors' calculations based on Child Support Supplement–Current Population Survey. See also "Additional Notes to Table A-1," below.

[a]Significant at the 1 percent level.
[b]Significant at the 5 percent level.
[c]Significant at the 10 percent level.
[d]Significant at the 15 percent level.

months after implementation (similar to its effect on the unconditional collection rate in Table 6). The effect of withholding on the award rate is probably an indirect one, reflecting the potential collection value of having an award.

Fourth, the negative effect on collections of charging a fee for non-AFDC cases appears to be acting primarily by reducing the probability of having an award and the level of the award for those with an award, rather than by reducing the collection rate.

Fifth, IV-D expenditures appear to be influencing aggregate collections primarily by increasing the collection rate. In results not shown, IV-D expenditures exert their largest influence on the amount of collections for those already receiving child support and have no effect on the probability of receiving collections. The fact that IV-D expenditures seem to be operating mainly through collections may be partially reflecting an emphasis on pure enforcement activities. In recent years, much of the IV-D program has been directed toward increasing collection rates for those who have an award and who are delinquent in their payments. It has only been very recently (since the 1988 Family Support Act) that policymakers have begun to recognize that the greatest gains in child support enforcement in the future can be made by increasing the number and amount of awards. As later CPS data become available, it will be of great interest to determine whether IV-D expenditures exert a stronger influence on the number and amount of child support awards.

Sixth, although provisions for including medical support in a child support order seem to have no significant effect on aggregate collections, they do appear to slightly reduce the probability of having an award.

Finally, paternity provisions surprisingly influence all three components of collections. They increase the probability of having an award, they increase the amount of the award given that there is an award, and they increase the collection rate. It is not clear why paternity provisions would affect award levels or collection rates, once an award has already been established. It seems likely that

states with laws allowing paternity to be established up to age 18 also have other policies we haven't measured that lead to higher award levels and collection rates.

C. Specification Tests for the Effects of Immediate Wage Withholding

The multivariate analysis just presented reveals statistically significant impacts of a variety of different policies. Generally, immediate wage withholding has the largest and most consistent impact of all the policy variables considered, although other policy variables are also often significant.

The impact of most of the policy variables is quite robust with regard to model specification. In addition, the significance of the variables is generally insensitive to which other policy variables are included in the equations.

Nonetheless, two qualifications are in order. First, as already noted, it is possible that some of our policy variables are correlated with other unmeasured policies or factors which are affecting child support payments. Second, it is possible that the policy impacts are reflecting reverse causality. That is, it may be that states with better (or worse, in the case of NAFDCFEE) child support performance records were the ones that passed these policies in the first place.

Although it is not possible to determine the importance of the first qualification, it is possible to test for the second qualification (reverse causation). Because immediate wage withholding has the largest and most consistent impacts on the child support outcomes we examine, we utilize this variable to test for reverse causality.[15] This is done by assuming the counterfactual and then reestimating the multivariate model. Specifically, we test for an effect for immediate withholding using earlier CSS-CPS data before immediate withholding was implemented, thus enabling a comparison of child support outcomes in states with and without immediate wage withholding prior to the implementation of immediate wage withholding. If reverse causality is present, spurious impacts of immediate withholding would exist in the years prior to the implementation of immediate withholding in the

relevant states as well as in the years subsequent to the implementation of immediate wage withholding.

The earlier CSS-CPSs (1979, 1982, 1984, and 1986) were used to conduct the specification tests.[16] The results of the tests are presented in Table 10. The tests reveal that for every outcome, the differences that existed in 1987 did not exist in earlier years (not a single coefficient is statistically significant in the years prior to 1987). In fact, in some earlier years, the states with immediate withholding fared worse (negative coefficients, though not statistically significant) than the states without immediate withholding. Thus, there is a good chance that the differences estimated as of 1987 are not due to reverse causality.[17]

As indicated earlier, the CSS-CPS indicates a general downward trend in child support payments and award levels between 1978 and 1985 and a slight upward trend between 1985 and 1987. This trend remains after adjusting for the effects of the control variables (see the negative coefficients on the survey year dummies in Appendix Table A-2). Despite the strong downward trend in the data, our results indicate positive effects for most of the policies, and these positive effects appear to increase over time. What is interesting is that these positive effects of the policy variables are generally insensitive to whether or not the estimated equation includes the year dummies. This robustness with respect to model specification also adds credibility to our findings.

V. CONCLUSIONS

This paper has used Current Population Survey data to investigate whether any of the child support policies implemented in recent years in the United States are significantly related to key child support outcomes. The preliminary analysis in this paper produces some very interesting results that offer considerable encouragement for future studies along the line adopted in this paper. Of the large number of policies evaluated, a sizable number appear to be exerting significant effects in the

TABLE 10

Specification Tests for the Effects of Immediate Wage Withholding on Child Support Outcomes

	Year				
Outcome	1978	1981	1983	1985	1987
Amount of child support received					
Effect	-193.2	68.3	79.4	100.0	219.5**
(Standard error)	(129.8)	(97.7)	(112.3)	(74.6)	(104.8)
Sample mean	$1,136.5	$942.5	$922.0	$893.7	$1,010.5
Whether child support is due					
Effect	.007	.033	-.014	.007	.027
(Standard error)	(.022)	(.021)	(.021)	(.020)	(.020)
Sample mean	.497	.494	.477	.507	.530
Amount of child support due					
Effect	-56.3	159.6	-21.8	83.7	204.1*
(Standard error)	(153.6)	(152.6)	(120.3)	(81.1)	(117.2)
Sample mean	$1,738.8	$1,494.3	$1,337.2	$1,345.0	$1,502.6
Collection rate					
Effect	.002	-.016	.016	-.015	.037**
(Standard error)	(.023)	(.022)	(.030)	(.025)	(.019)
Sample mean	.303	.305	.307	.318	.332
Sample size	3,406	4,034	4,073	3,936	4,075

Source: Authors' calculations based on Child Support Supplement-Current Population Survey. See also "Additional Notes to Table A-1," below.

Notes: Standard errors in parentheses. Effects are adjusted for economic and demographic characteristics of custodial mothers and their families. Effects are measured over all custodial mothers identified in CSS/CPS.

*Significant at 10 percent level.
**Significant at 5 percent level.

expected direction. Those exerting positive effects on child support payments and award levels include wage withholding (both immediate as well as in response to delinquency), publicizing the availability of child support enforcement services, allowing paternity to be established until a child's eighteenth birthday, requiring payment of child support through a third party, and, with one exception, administrative expenditures by state child support enforcement programs. Those exerting negative effects include charging fees for non-AFDC families and requiring that medical support be included in a child support order. Noticeably insignificant in every specification for every outcome are variables denoting whether numerical guidelines have been implemented. It is probably too early to determine whether the guidelines are having an effect in most of the states. Future work needs to focus more on evaluating the impacts of the guidelines.

An analysis of how the policies influence the various components of child support collections reveals that many of the policies are affecting only certain components of aggregate child support collections. Perhaps the most interesting finding is that IV-D expenditures appear to be primarily influencing collection rates through increasing payments for persons already receiving child support. IV-D expenditures have not generally been exerting a significant influence on either the probability of obtaining an award or the probability of receiving child support given that an award exists (the latter result is not shown in this paper). With the passage of the Family Support Act in 1988, the IV-D program appears to be moving towards a focus on establishing and maintaining child support awards, in addition to collecting child support for those with an award. As later CPS data become available, it will be of great interest to update the analysis in this paper to determine whether this new emphasis of the IV-D program will affect the influence of IV-D expenditures on the various components of aggregate child support collections.

Although the results are, for the most part, quite plausible, there are a few anomalies that suggest the findings in this paper should be viewed as preliminary. Future research should incorporate additional years of data and should seek to develop better measures of state policies.

APPENDIX TABLE A-1

Implementation Dates for Policy Variables and Average CSE Expenditures, by State

State	WITHDEL	IMMWITH	MEDICAL	GUIDE	PATERN	NAFDCFEE	SERVPUB	MANDPAY	CSEEXP
AL	5/84	--	10/85	9/85	5/84	9/85	9/85	--	107.57
AK	--	--	3/86	5/86	11/85	11/85	11/85	--	515.12
AZ	8/85	--	8/73	8/73	8/71	10/85	5/86	Yes	112.69
AR	11/85	--	8/85	8/85	8/85	8/85	10/85	--	100.85
CA	--	--	3/87	7/85	5/75	2/86	11/85	--	228.81
CO	10/85	--	10/86	7/86	10/85	12/83	10/85	--	138.20
CT	10/85	--	7/82	--	10/85	4/86	10/85	--	186.52
DE	--	--	10/85	11/77	5/83	9/85	10/85	--	154.81
DC	4/87	--	10/85	--	8/84	10/85	10/85	--	216.88
FL	12/86	--	9/85	--	11/85	9/85	10/85	--	98.56
GA	--	--	12/85	12/85	10/75	9/85	8/85	--	58.44
HI	9/86	--	7/87	10/86	1/83	10/85	9/85	--	216.88
ID	6/86	--	10/85	--	10/85	7/86	7/86	--	143.36
IL	1/86	--	1/84	2/85	7/85	10/86	10/85	--	79.64
IN	--	--	5/84	--	9/80	6/85	3/85	--	70.48
IA	3/86	--	12/84	11/84	10/85	12/84	10/85	Yes	142.34
KS	--	--	7/85	--	7/85	6/85	10/85	--	129.54
KY	--	--	11/84	--	10/86	10/85	11/85	--	114.44
LA	12/85	--	5/86	--	10/81	3/86	11/85	--	120.84
ME	9/86	--	9/86	12/75	12/68	12/76	10/85	--	149.49
MD	--	--	10/85	--	7/85	1/84	10/85	--	176.67
MA	7/83	7/86	6/86	--	12/82	6/86	6/86	--	192.84
MI	7/83	--	5/86	5/87	6/86	10/85	10/85	Yes	186.65
MN	7/81	8/87	7/83	9/83	8/80	10/85	10/85	--	273.95
MS	10/85	--	10/85	--	12/81	10/85	10/86	--	52.02
MO	7/86	--	3/85	--	8/81	10/85	10/85	--	104.90
MT	10/85	--	10/86	10/85	6/87	12/80	10/85	--	103.37
NE	3/86	--	7/84	--	3/86	10/85	9/85	Yes	155.89
NV	--	--	8/86	10/86	8/81	10/85	10/85	--	187.75
NH	6/82	--	10/84	10/85	10/85	7/82	10/85	--	117.78
NJ	10/85	--	--	11/85	10/84	3/86	12/85	--	239.36
NM	11/85	--	1/85	10/85	10/85	10/85	11/85	--	109.18
NY	11/85	--	--	--	11/85	12/85	8/85	--	200.21
NC	--	--	5/85	9/86	9/85	9/85	12/83	--	103.83
ND	--	--	10/85	2/84	7/78	10/85	10/84	Yes	176.45

(table continues)

TABLE A-1, continued

State	WITHDEL	IMMWITH	MEDICAL	GUIDE	PATERN	NAFDCFEE	SERVPUB	MANDPAY	CSEEXP
OH	6/87	12/86	10/84	--	6/82	10/85	7/85	--	98.85
OK	1/86	--	10/86	--	1/86	1/86	1/86	--	104.15
OR	10/85	--	10/85	4/86	10/83	10/85	10/85	Yes	228.44
PA	1/86	--	1/86	1/86	1/86	10/85	10/85	Yes	202.72
RI	7/84	--	6/77	--	5/79	12/76	10/85	--	108.97
SC	9/85	--	10/84	3/80	8/85	10/85	10/85	--	66.32
SD	9/86	--	11/85	12/85	9/86	10/84	4/85	--	143.43
TN	10/85	--	10/85	--	5/84	10/85	10/85	--	73.12
TX	3/87	9/85	3/87	2/87	9/83	10/85	10/85	--	60.10
UT	7/84	--	3/86	3/84	12/76	10/85	10/83	--	315.07
VT	--	--	3/86	9/87	3/83	6/80	1/86	--	133.16
VA	--	--	10/85	7/77	10/75	10/85	10/85	--	95.60
WA	10/85	--	11/85	3/86	2/76	10/85	12/85	--	215.01
WV	4/87	--	3/87	--	8/86	9/85	11/85	--	105.17
WI	2/78	8/87	7/82	2/82	7/81	10/85	10/85	Yes	216.45
WY	--	--	10/85	10/85	7/78	10/84	10/85	--	77.78

Note: Implementation dates are as of December 1987 and CSE expenditures are average administrative expenditures per female-headed family over the sample period (1978, 1981, 1983, 1985, 1987), in constant 1987 dollars.

Additional Notes to Table A-1

All dates in Table A-1 refer to implementation dates, as indicated on the Office of Child Support Enforcement (OCSE) Legislative Tracking System's Accomplishment Report for each state, as of December 1987. Sometimes the date may in fact refer to the date that the procedure was approved by the OCSE though (and thus the state could, perhaps, have been operating a similar procedure before).

WITHDEL

Withholding under Delinquency: For cases in which a support order is or has been issued or modified in the state, and is being enforced under the state plan, states must have a law whereby an absent parent becomes subject to mandatory wage withholding when unmade payments are at least equal to support payable for one month, when the absent parent requests such withholding, or at an earlier date if the state feels it is in the best interests of the parties involved. Source: OCSE Legislative Tracking System's (LTS) 12/4/87 Accomplishments Reports.

Withholding Provision in Order: States are required to have legal procedures requiring that all child support orders which are issued or modified will include a provision for withholding from wages in order to assure that withholding as a means of collecting child support is available if arrearages occur without the necessity of filing an application. Source: OCSE LTS Accomplishment Reports.

Court Action Required for Withholding: In some states court action is required to initiate withholding. This does not include the original support order, or court involvement should the obligor contest withholding. Source: Policy Studies, Inc. Note: If "Clerk of Court" was required, this was not taken to mean court action was required.

IMMWITH

Immediate Withholding: A few states had immediate withholding in 1987; not every child support order in those states was subject to the provision, however. Four states (Arizona, Illinois, Hawaii, and Virginia) passed immediate withholding legislation after 1987. Source: Mathematica Policy Research final report on evaluation of the 1984 Child Support Amendments.

MEDICAL

Medical Support in Orders: State agencies are required to petition for inclusion of medical support as part of any child support order whenever health care coverage is available to the absent parent at a reasonable cost. Source: OCSE LTS Accomplishment Reports.

GUIDE

Child Support Guideline: Each state must establish guidelines for child support award amounts, and make them available to all judges or other appropriate officials. The guidelines are not necessarily binding. Source: OCSE LTS Accomplishment Reports.

PATERN

Paternity Statute: States were required to have a law permitting the establishment of paternity until the child's 18th birthday. Source: OCSE LTS Accomplishment Reports.

NAFDCFEE

Non-AFDC Application Fee: The federal government required that states impose an application fee for furnishing child support services to non-AFDC cases. The state may set it at any amount it wants, not exceeding $25, and may collect from the individual applying, the absent parent, or may pay it out of state funds (though if they do this, it cannot count as an administrative cost to be reimbursed by the feds). Source: OCSE LTS Accomplishment Reports.

SERVPUB

Services Publicized: The state must regularly and frequently publicize, through public service announcements, the availability of child support enforcement services, including any fee and the phone number and address for more information. Source: OCSE LTS Accomplishment Reports.

MANDPAY

Mandatory to Pay Agency: This policy was not part of the 1984 Child Support Amendments or the 1988 Family Support Act. In some states, payments must be made directly to an agency (administrative agency, clerk of court, etc.) as opposed to, for instance, the obligee. The states that had such a requirement by July 1984 are listed here. The source for this was Marygold S. Melli, "Child Support: A Survey of the Guidelines," Institute for Research on Poverty Special Report #33, University of Wisconsin-Madison, Table 10, pp. 37-39. Only those states listed in her table under "mandatory to pay agency" purely, or not qualified by footnote "h" (either friend of court or clerk of court) or "k" (in non-welfare cases, the payments may be to either agency or clerk of court; under special provision, payment may be deposited to bank account with receipt sent to clerk) were included.

CSEEXP

Administrative Expenditures per female-headed family for the Child Support Enforcement Program (in 1987 dollars): This variable is constructed by dividing reported administrative expenditures for the Child Support Enforcement Program by the number of female householder families with children and is adjusted using the Consumer Price Index. The source for the administrative expenditure data is U.S. Department of Health and Human Services, Office of Child Support Enforcement, Annual Report to Congress, various issues. The source for the number of female householder families with children for 1980 is U.S. Bureau of the Census, 1980 Census of Population, Volume 1, Chapter D, Part 1-52, September 1983. For the other years, the number of female householders with children was adjusted by nationwide percentage changes in the number of female-headed families with children. The percentage adjustments were -7.6 percent for 1978, 3.47 percent for 1981, 5.01 percent for 1983, 10.3 percent for 1985, and 15.65 percent for 1987. The source of these nationwide changes is U.S. Bureau of the Census, Statistical Abstract of the United States, various issues.

APPENDIX TABLE A-2
Coefficients for Control Variables
(Standard Errors in Parentheses)

	Outcome Variable			
Control Variable	CHDSPREC	DUE	CHDSPDUE	COLLRATE
CONSTANT	-2082.8[a]	-.0271	-2080.2[a]	-.218[a]
	(113.6)	(.022)	(135.2)	(.026)
NE	82.53	.00706	187.4[a]	.00954
	(55.94)	(.0094)	(57.18)	(.0111)
NC	-27.23	.00325	44.15	-.0215[b]
	(44.27)	(.00930)	(55.50)	(.0108)
WEST	-259.3[a]	-.0159[c]	-152.2[a]	-.0537[a]
	(55.10)	(.00940)	(60.01)	(.0109)
BLACK	-629.9[a]	-.125[a]	-625.0[a]	-.121[a]
	(43.18)	(.00858)	(52.15)	(.00995)
EDUCATION	148.60[a]	.0204[a]	161.9[a]	.0241[a]
	(6.82)	(.00136)	(8.24)	(.00158)
MARRIED	950.6[a]	.525[a]	1772.6[a]	.288[a]
	(62.90)	(.0125)	(75.96)	(.0145)
SEPARATED	707.8[a]	.282[a]	1195.0[a]	.163[a]
	(62.89)	(.0125)	(76.03)	(.0145)
DIVORCED	1243.6[a]	.594[a]	2024.8[a]	.354[a]
	(56.66)	(.0113)	(68.45)	(.0131)
KIDS	306.9[a]	.0280[a]	411.5[a]	.0175[a]
	(17.47)	(.00347)	(21.11)	(.00404)
AGE	20.14[a]	-.00208[a]	14.13[a]	.00231[a]
	(2.02)	(.000401)	(2.44)	(.000466)
PARMAR	-370.1[a]	-.0805[a]	-701.8[a]	-.0137
	(56.06)	(.0112)	(67.77)	(.0130)
YEARSDIV	-78.01[a]	-.0118[a]	-100.3[a]	-.0126[a]
	(4.94)	(.000982)	(5.97)	(.00114)
Y2	-250.5[a]	-.0121	-288.7[a]	-.0106
	(51.63)	(.0103)	(62.07)	(.0119)
Y3	-298.6[a]	-.0299[a]	-455.6[a]	-.01008
	(53.75)	(.0105)	(62.77)	(.0122)
Y4	-342.6[a]	-.0292[d]	-419.2[a]	.00356
	(61.33)	(.0203)	(64.64)	(.0163)
Y5	-184.4[b]	-.0382	-145.7[a]	-.0221
	(76.44)	(.0319)	(77.05)	(.0349)

Note: Results are for the specification given in the last column of Tables 3-7. SOUTH, UNMAR, and NONBLACK are the omitted categories. Horizontal rules in body of table were inserted by the editor for ease of reading.

[a]Significant at the 1 percent level.
[b]Significant at the 5 percent level.
[c]Significant at the 10 percent level.
[d]Significant at the 15 percent level.

Endnotes

[1]A much larger set of provisions were examined during the exploratory stages of this research, but were excluded from the final set considered because they were mostly minor provisions that never exerted a statistically significant impact on any of the outcomes examined. The provisions excluded from the final analysis were related to expedited processes, state and federal tax refund offsets, liens, securities or bonds, consumer credit, retroactive arrears, fees for late payments, continuation of services, enforcement for foster care, incentive payments, and extension of medicaid eligibility. Implementation dates for the provisions not included in this paper are presented in an appendix available from the authors.

[2]Two earlier studies using a similar approach to evaluate child support policies are Dickinson and Robins (1983) and Beller and Graham (1991).

[3]The sixth round of the CSS-CPS, administered in March-April 1990 and covering the year 1989, was not available when this study was initially undertaken.

[4]See Robins (1992) for details on this downward trend in child support.

[5]The test we performed is similar to one performed by Beller and Graham (1991).

[6]One might argue that wage withholding is likely to exert an impact only on child support payments and not award levels. However, it is possible that the existence of wage withholding could induce a mother to seek an award. Since the award level (in the analysis of the full sample of mothers, including those without awards) is the product of the probability of having an award and the level of the award given there is one, withholding could also affect the award level.

[7]As Table A-1 indicates, the value of CSEEXP in Alaska is more than double the value in almost every other state. Our exploratory analyses indicated that the results for this variable were quite sensitive to whether or not Alaska was included in the sample. Therefore, we excluded the 304 observations in Alaska from the final sample. This is equivalent to including the Alaska observations

and allowing the coefficients to differ from those for the other states. Including Alaska and allowing it to have a separate additive impact yielded similar but slightly less significant impacts.

[8]Because the policy variables are correlated with one another, this procedure does not guarantee that another "best" specification would result if the variables were removed in a different order. Thus, it is not an exact method for determining the "best" specification. However, it is a reasonable approach to sorting out the effects of a large number of correlated variables. Other methods, such as factor analysis, could be used, but factor analysis also has limitations. We estimated several factor models on the larger set of policy variables, but this exercise was generally uninformative.

[9]The estimated effects of the control variables (including the year dummies) are presented in Appendix Table A-2, for the broadest specification tested. Although not the focus of this paper, the coefficients of the control variables are sensible and often statistically significant. The control variables indicate that child support payments and awards are lower for blacks, increase with education, are higher for divorced, (re)married, and separated mothers relative to never married mothers, increase with the number of children in the family, increase with the age of the mother, are lower for mothers who suffered a marital disruption during the survey year (shown by the coefficient on PARMAR), and decline over time since the disruption. The coefficients also indicate that there was a general downward trend in child support award and payment amounts from 1978 to 1985 and than a slight turn upward in 1987, but not enough to return to 1978 levels (see Robins, 1992, for more details on the downward trend in award amounts from 1978 to 1985).

[10]The negative price sensitivity implies that the child support enforcement services lead to higher child support payments for those that use them.

[11]This effect, however, holds the policy variables constant and implies that <u>given</u> the existence of the policies in the equation, additional expenditures are not cost-effective.

[12]The elasticity (.08) is calculated as the coefficient (.515) times the ratio of the average per capita expenditures ($152.5) to the average amount of child support received ($976.4).

[13]In several of the other specifications, the coefficient of CSEEXP was also negative and very close to being statistically significant.

[14]This is not the only way to break down total collections into several components. Another way is to break down total collections into the probability of having an award, the amount of the award given that there is an award, and the collection rate given that there is an award.

[15]It is possible that some of the measured policies interact with immediate wage withholding (rather than being simply additive as we have specified). This possibility is testable but later CSS-CPS data are really needed to perform tests of interactions in a rigorous fashion.

[16]Only Texas had instituted a system of immediate wage withholding prior to 1986 and their system was only in place for three months in 1985. Thus, we would expect no impacts in 1978, 1981, and 1983, and very small impacts in 1985.

[17]Note that the coefficients in Table 10 are not directly comparable to the coefficients in Tables 3 through 9 because the data are not pooled over time and a slightly different specification is used.

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