# How Did the 2004 Change in Wisconsin's Guidelines Affect Child Support Payments? 

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## I. INTRODUCTION

Effective January 1, 2004, Wisconsin's child support guidelines were changed so that payers who had low or high incomes could face lower child support orders than had earlier been the case. The child support guidelines that took effect on January 1, 2004, provided that courts have the option of using tables developed for low- and high-income payers, or of using the traditional guidelines, in cases when the child's placement is entirely with the other parent. The method of calculating child support in cases with placement shared between parents was also changed to allow for reductions in child support for parents with placement for at least 25 percent of the time, instead of the previously established 30 percent of the time.

An earlier IRP report (Rothe et al. 2007) noted that about 41 percent of all orders established in the period from 2002 through 2006 were set in compliance with Wisconsin's guidelines, although this figure varied substantially depending on the type of case (adjudicated paternity, voluntarily acknowledged paternity or divorce). The report further documented that orders set before January 1, 2004, were more likely to comply with the old guidelines than were the orders set after that date to comply with the new guidelines. Finally, the report noted that the pattern of noncompliance (whether above or below the guidelines) changed after 2004, especially for divorce cases. The authors hypothesized that a variety of factors might have led the courts to set or approve orders that were not compliant with the new guidelines that came into effect after January 2004, but the report offered no firm conclusions on that point.

This report continues to examine changes associated with the January 2004 guidelines modification by focusing on payments, rather than orders. The report examines relationships between the payments made before and after January 1, 2004, and other variables, focusing primarily on low- and high-income payers in sole placement cases. Section II of the report reviews prior research and rationales
for changing the guidelines; Section III provides information on the data used in the analysis; Section IV presents findings; and Section V provides conclusions and implications for future research.

## II. PREVIOUS RESEARCH

Wisconsin data offer little evidence that orders set at a lower percentage than Wisconsin's pre2004 guidelines generate improved payment compliance, except for very low-income payers. Researchers have found, however, that payment compliance tended to fall as orders rose above the proportions stipulated in the pre-2004 guidelines. Bartfeld and Meyer (1993) found that compliance declined among fathers in paternity cases when the order is for more than 20 percent of their income. ${ }^{1}$ (This ratio of the amount owed to the payer's income is generally referred to as the "burden.") Meyer and Bartfeld (1996) found that the burden of orders did not affect compliance in divorce cases unless the order was for more than 35 percent of the payer's income. In later work, Meyer (1999) found a similar pattern, although compliance rates for divorce cases tended to diminish at a higher burden (about 30 percent) than did those for paternity cases (about 20 percent).

More recent work (Hu and Meyer, 2003) studied the question of whether total payments (as opposed to compliance) rise when orders are reduced. The authors found that, for all income groups except those in which fathers had incomes less than $\$ 10,000$ per year, child support payments increase as the burden increases, suggesting that higher orders generally result in higher payments. In research using national data (a sample of mothers receiving child support between 1978 and 1985), Beller and Graham (1993) similarly found that the order amount was by far the most important predictor of the amount received.

[^0]
## Rationale for Changing the Child Support Guidelines

Although other factors affect compliance, the research cited above suggests that most Wisconsin child support orders were probably not set so high before 2004 as to discourage payment, except perhaps among very low-income payers. Nevertheless, the existence of high rates of noncompliance and growing levels of arrears before 2004 led many advocates to suspect that child support guidelines resulted in orders so high as to discourage payment. Partly in response to these concerns, the Wisconsin Department of Workforce Development announced in March 2001 the formation of an advisory panel to review the state's child support guidelines and make recommendations to the Department for changes in them. The report of the Child Support Guidelines Review Advisory Committee ${ }^{2}$ proposed reductions to the guidelines for low- and high-income payers. The Committee's rationale for reducing orders for lowincome payers was to increase compliance, reduce arrears, increase emotional and financial investments by the payers in their children, and improve the attachment of noncustodial parents to the formal labor market. The rationale for proposing reductions in orders for high-income payers was to diminish the friction and litigation between parents, improve payers' relationships with their children, and increase the ability of high-income payers to contribute to post-minority costs, such as college educations. ${ }^{3}$ The Committee recommended that the high-income reduction be limited to payers with incomes above $\$ 150,000$ annually ( $\$ 12,500$ per month), but noted that payers with incomes somewhat below that level might also benefit from reduced orders associated with the reduction in the shared placement threshold.

The final guidelines, as approved by the Wisconsin Legislature, set the income thresholds at $\$ 950$ per month for low-income payers and $\$ 7,000$ per month for high income payers. The new guidelines allowed courts to reduce orders for payers with incomes below or above those amounts. Guidelines for

[^1]payers with incomes between $\$ 950$ and $\$ 7,000$ per month generally remained unchanged, except for some parents with shared placement of their children.

The remainder of this paper discusses the apparent influence of the new high- and low-income guidelines on payments. The report focuses primarily on sole-placement cases, in part because about half of all shared-placement cases in our sample have no order, and therefore have no requirement for one parent to make payments to the other.

## III. DATA AND METHODOLOGY

This report uses Cohorts 23 and 24 of the Institute for Research on Poverty's Court Record Dataset. These cohorts consist of a representative sample of cases collected in 21 counties $^{4}$ in which the original petition for a child support order was filed with a court between July 1, 2002, and July 30, 2004. Cases had to meet the following criteria for inclusion in the CRD:

1. The potential for child support payments exists for at least one year.
2. There is at least one minor child who does not "age out" in less than one year after the data of the petition.
3. There is a temporary order and/or a final judgment.

For the cases in the given time period that met these criteria, all court activity was collected through approximately mid-2006. These data were then merged with data from KIDS; in this paper, all the reported owed and paid data are obtained from KIDS records.

For this report, we begin with the sample we constructed for the companion report (Rothe et al., 2007). As noted in that report, many cases have more than one order during the data collection period. When possible, we attempted to use the first final order associated with the child(ren) or the divorce action that caused the petition to come before the court. In a few cases we selected a temporary order, if that was the only order for which income information was available.

[^2]We then deleted a number of orders to arrive at the "full" analysis sample. We deleted 336 orders because the collected order was a serial order; we also deleted 111 orders because there was no data match for them with KIDS data. We deleted 63 orders because they did not require payment for a full year after being set. Finally, we deleted 75 orders in which the mother was the payer, because there were not enough mother-payer cases to analyze. This left a total of 1829 unweighted cases in the final sample; in all cases, the mother has sole custody of the child(ren) and the father is the noncustodial parent.

Using this sample we examine several outcomes potentially related to cases' ability to pay their child support orders. These include measures of the noncustodial father's earnings, the absolute size of the obligation, and the burden of the order (the size of the obligation compared to the payor's earnings). We also examine the father's response to these obligations: the total amount of child support he paid, his compliance with the order (the amount of payment compared to the amount owed), and the payment burden (the amount he actually paid compared to his earnings). Each outcome is measured for a full year following the imposition of the child support order, starting at the beginning of the quarter after the order date.

Data on the amount of child support owed and paid is available from KIDS and attached to each CRD case record by IRP programmers; we sum the monthly amounts to create annual totals. Owed amounts refer only to what is owed in current child and family support each month (arrears, past support, and medical support are excluded). Information on father's annual earnings is from the state's Unemployment Insurance Wage Record system (UI), which receives earnings reports on most (but not all ${ }^{5}$ ) earnings in the state. Since it is possible for UI data to miss some earnings, and approximately onethird of cases in our sample have no UI-reported earnings in the year of observation, we supplement UI earnings reports with the income reported in the CRD. If the father has no quarters in the UI data with

[^3]reported earnings, then we use annualized income from the court record. ${ }^{6}$ Paid, owed, and earnings amounts are then adjusted for inflation and reported in 2003 dollars.

Given total amounts of child support owed, paid, and father's earnings, we then calculate the payment compliance and burden amounts. Payment compliance is the percentage of the child support owed that the father has paid. Cases showing payments higher than the total amount owed are assigned a compliance level of 100 percent. ${ }^{7}$ The burden of the father's child support order is calculated as the percentage of his total annual earnings owed to current support. In cases where reported earnings were very low, we find cases in which the burden is very large (over 100 percent); because it is likely that many of these cases result from underestimated earnings, and because the inclusion of these cases (although few) had a large effect on the resulting mean burden estimate, we limit our analysis of the burden to those cases with at least $\$ 1000$ of annual reported earnings. ${ }^{8}$

Our primary concern is the difference in outcomes among those cases who received their child support order under the child support guidelines in effect before the January 1, 2004, change and those who received their order after the change, so all comparisons show outcomes for pre- and post-January 2004 cases. We examine whether there are differences in outcomes and pre-post changes in outcomes for different types of cases based on whether they are a divorce or paternity cases, whether their order was consistent with the contemporaneous child support guidelines, the case location, and the father's income level. We then use regression models to examine the relationship among various case characteristics and the outcomes when we hold other case characteristics constant.

[^4]Finally, we use an interacted model to estimate whether the January 2004 change in the child support guidelines had a significant effect on these outcomes. This model compares the pre-post change in outcomes for cases we would expect to be affected (low- and high-income cases) with changes for cases we would not expect to be affected (medium-income cases).

## IV. FINDINGS

We first present tables with descriptive statistics about the payments made in our sample of orders. The tables contain measures of payments for orders set before January 1, 2004, in columns headed "Pre," and for orders set after that date in columns headed "Post." The measures included are the mean owed amount, the mean payment amount, mean earnings, the mean owed-to-earnings burden, the median owed-to earnings burden (for some samples), the mean payment-to-owed compliance rate, and the mean paid-to-earnings burden. All tables are calculated using data weighted to compensate for the over- and under-sampling of different types of cases that occurred during data collection; the weighted sample is designed to represent a randomly selected sample from the 21 counties from which data are collected.

From all the data collected, we define three different samples, based on the type of case and the amount of data available for that order. After the exclusions identified in the previous section, the full sample consists of 974 unweighted ( 955 weighted) orders set before January 1, 2004, and 855 unweighted (870 weighted) orders set after that date. ${ }^{9}$

The second sample is a subsample of the first and consists of orders for an amount greater than zero. This sample allows some additional payment measures, such as payment amount divided by owed amount, to be calculated. This sample contains 824 unweighted ( 816 weighted) pre-January 1, 2004 orders and 727 unweighted ( 731 weighted) post-January 1, 2004 orders.

[^5]The third sample is a subsample of the second sample and consists of orders that are greater than zero (as in the second sample) and for which we have information that the payer's income is greater than $\$ 1,000$. This sample reflects our efforts to compensate for orders that were higher than seemed likely, given our information that the payer's income was very low. This sample contains 562 unweighted ( 576 weighted) pre-January 1, 2004, orders and 467 unweighted (454 weighted) orders from after that date.

The data collection process, coupled with decisions we made about what cases to delete and how to define whether an order should be considered pre- or post-January 1, 2004, has resulted in a substantial change in the distribution of case types between the pre- and post- samples, with the post- sample showing a higher percentage of divorce cases and a lower percentage of voluntarily acknowledged paternities. For example, the weighted pre-January 1, 2004, full sample contains 24 percent divorce cases, 22 percent voluntarily acknowledged paternities and 54 percent adjudicated paternities. In contrast, the weighted post-January 1, 2004, full sample contains 36 percent divorce cases, 10 percent voluntarily acknowledged paternities and 54 percent adjudicated paternities.

This compositional change appears to stem from the longer time between the initial court petition and the date of the child support order in divorce and adjudicated paternities than is the case for voluntary paternities. ${ }^{10}$ As a consequence, a higher proportion of divorces and adjudicated paternities that had an initial petition date before January 1, 2004, have an order set after that date. Whereas 45 percent of divorce cases and 27 percent of paternity cases that had an initial petition date before January 1, 2004, had an order data later than that, only 10 percent of voluntarily acknowledged paternities with an initial petition date before 2004 had their order set in 2004 or later.

[^6]In some of the following tables, this compositional shift between the pre- and post-January 1 , 2004 samples creates comparisons that are not intuitively obvious. However, we control for the distributional differences in the regression analyses that follow.

Table 1 presents payment measures for all three samples. The first panel shows all cases combined; the second, third and fourth panels show the disaggregation of these measures according to type of case. The impacts of the changing samples are as we would expect. By deleting all zero orders, the mean owed and payment amounts are higher in the "Owe>\$0" sample than in the "All orders" sample. The amounts are still higher in the third sample, "Owe>\$0 and Earnings>\$1000." The table shows how these measures change between the pre- and post-January 1, 2004, orders. The results in the top panel, which combines divorce and paternity cases, should be interpreted with caution. Because the elapsed time from initial petition to order is longer for divorce and adjudicated paternity cases, they are overrepresented in the "post" period. Therefore, the first panel confounds differences by case type (divorce/paternity) and changes over time (pre/post). The top panel shows that for all three samples, the mean owed, mean payment amounts, and mean earnings are higher after January, 2004. However, much of the apparent pre/post difference is actually due to the greater proportion of divorce cases in the post period.

Once we have disaggregated by type of case (in the bottom three panels), few changes between pre- and post-periods are statistically significant. Only mean earnings for the voluntary paternity cases differ significantly from the pre- to the post-period. Moreover, the direction of the changes for this variable (and some others) is reversed from that shown in the top panel. That is, the significant change in mean earnings for the first two samples ("all" and "owe $>\$ 0$ ") now decline from the period before January 1, 2004, to the period afterwards.

There is relatively little change (and no changes that are significant) for mean amount owed and mean payment amount in divorce cases, regardless of which sample is used. We might expect to see more of a decline for divorce cases in the amounts owed (rather than the small increase that appears for the

|  | N |  | Mean Owed Amount (\$2003) |  | Mean Payment Amount (\$2003) |  | Mean Earnings (\$2003) |  | Mean Burden (Owed /Earned) |  | Mean Compliance (Paid/Owed) |  | Mean Payment Burden (Paid/Earned) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Pre- | Post- | Pre- | Post- | Pre- | Post- | Pre- | Post- | Pre- | Post- | Pre- | Post- | Pre- | Post- |
| All | 955 | 870 | \$2,984 | \$3,265 | \$2,263 | \$2,653* | \$14,873 | \$15,380 | 19.47\% | 48.47\% |  |  | 12.01\% | 15.18\%* |
| Owe $>0$ | 816 | 731 | 3,660 | 4,075* | 2,754 | 3,215* | 16,118 | 1,7058 | 21.15 | 53.91 | 55.14\% | 57.26\% | 12.97 | 16.67* |
| Owe >0, |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| All |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Divorce | 228 | 316 | 5,868 | 5,929 | 5,212 | 5,377 | 32,434 | 29,867 | 20.47 | 74.28 |  |  | 16.63 | 18.29 |
| Voluntary Paternity | 212 | 83 | 2,698 | 2,304 | 1,895 | 1,570 | 13,461 | 10,063* | 18.98 | 20.14 |  |  | 10.53 | 10.88 |
| Adjudicated Paternity | 515 | 471 | 1,825 | 1,653 | 1,109 | 1,019 | 7,684 | 6,612 | 19.00 | 18.24 |  |  | 9.40 | 11.73 |
| Owe $>0$ |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Divorce | 207 | 292 | 6,726 | 6,700 | 5,906 | 5,843 | 30,923 | 29,868 | 23.17 | 82.72 | 77.25 | 76.55 | 18.65 | 19.99 |
| Voluntary Paternity | 198 | 71 | 3,032 | 2,838 | 2,129 | 1,926 | 14,422 | 10,575* | 20.02 | 23.08 | 59.03 | 63.69 | 11.02 | 12.38 |
| Adjudicated Paternity | 410 | 368 | 2,405 | 2,224 | 1,453 | 1,370 | 9,403 | 8,108 | 20.38 | 20.12 | 42.00 | 40.70 | 10.02 | 12.94 |
| Owe $>0$, Earnings $>\$ 1000$ |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Divorce | 178 | 242 | 7,219 | 7,246 | 6,550 | 6,654 | 35,728 | 35,604 | 23.17 | 24.66 | 83.11 | 83.92 | 18.65 | 20.14 |
| Voluntary Paternity | 159 | 39 | 3,146 | 3,094 | 2,229 | 2,169 | 17,738 | 18,652 | 20.03 | 23.08 | 60.10 | 69.23 | 11.02 | 12.38 |
| Adjudicated Paternity | 239 | 172 | 2,667 | 2,947 | 1,801 | 2,211 | 15,914 | 17,106 | 20.39 | 20.12 | 49.32 | 56.53 | 10.02 | 12.94 |

*Pre-Post difference significant at $\mathrm{p}<.05$.
entire sample and the Owe $>\$ 0$ and Earnings $>\$ 1000$ ), but the changes in mean earnings are also not significant. ${ }^{11}$

There are no significant changes in the mean burden for any case type. ${ }^{12}$ Similarly, there are no significant differences in the mean compliance or mean payment burden for any disaggregated case type, using any sample. Thus, it appears that once we disaggregate the sample by case type, very little consequential change occurred between the pre-January 1, 2004, sample and the sample with orders set after that date. In subsequent tables we examine the data through the filter of NCP earnings and by urban/rural county groupings to see if this pattern of essentially no impact from the guidelines amendments continues to be present.

Table 2 shows the samples disaggregated by income levels at the time of the order in categories that reflect the guidelines revisions. For obligors with incomes below $\$ 950$ per month, the table shows two rows: obligors with zero income and obligors with low income. ${ }^{13}$ Because of the importance of case type in understanding potential changes, Table 2 displays three main panels, one each for divorce, voluntary paternity and adjudicated paternity. All panels in Table 2 are shown using the sample "owe > $\$ 0$," except that for measures of burden, the sample "owe $>\$ 0$, earnings $>\$ 1000$ " is used. ${ }^{14}$

Table 2 shows very little significant change between orders set prior to January 1, 2004, and those set after that date. All significant changes are confined to low-income payers, although the patterns vary somewhat by type of case. Among low-income divorce cases, a very large and significant increase in the mean payment amount occurred. An increase in mean payment amount also occurred among voluntary

[^7]|  | N |  | Mean Owed Amount (\$2003) |  | Mean Payment Amount (\$2003) |  | Mean Earnings (\$2003) |  | Mean Burden ${ }^{\text {a }}$ (Owed /Earned) |  | Mean Compliance (Paid/Owed) |  | Mean Payment Burden <br> (Paid /Earned) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Pre- | Post- | Pre- | Post- | Pre- | Post- | Pre- | Post- | Pre- | Post- | Pre- | Post- | Pre- | Post- |
| Divorce |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| \$0 | 9 | 7 | \$3,020 | \$2,914 | \$718 | \$1,016 | \$0 | \$0 |  |  | 18.21\% | 25.71\% |  |  |
| Low | 15 | 27 | 3,256 | 4,534 | 498 | 2,321* | 8,570 | 7,771 | 40.39\% | 63.44\% | 21.69 | 58.39* | 5.53\% | 33.26\%* |
| Medium | 153 | 212 | 6,962 | 7,322 | 6,554 | 6,729 | 33,699 | 36,445 | 21.92 | 20.51 | 88.99 | 86.17 | 20.07 | 18.40 |
| High | 11 | 8 | 16,344 | 14,649 | 14,779 | 18,393 | 101,067 | 101,982 | 17.00 | 16.90 | 81.11 | 91.49 | 15.24 | 18.79 |
| Voluntary Paternity |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| \$0 | 0 | 2 |  | 950 |  | 254 |  | 0 |  |  |  | 25.82 |  |  |
| Low | 61 | 11 | 2,143 | 2,494 | 664 | 832 | 8,708 | 7,215* | 26.07 | 45.49* | 28.50 | 49.36 | 7.66 | 15.16* |
| Medium | 99 | 29 | 3,685 | 3,339 | 3,135 | 2,678 | 22,903 | 23,092 | 16.24 | 14.72 | 79.54 | 76.27 | 13.03 | 11.22 |
| High | 0 | 0 |  |  |  |  |  |  |  |  |  |  |  |  |
| Adjudicated Paternity |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| \$0 | 2 | 5 | 1,218 | 1,055 | 0 | 244 | 0 | 0 |  |  | 0 | 13.57 |  |  |
| Low | 132 | 70 | 2,021 | 2,023 | 591 | 1,008 | 8,447 | 7,936* | 24.46 | 27.16 | 26.54 | 30.77 | 7.02 | 13.99 |
| Medium | 106 | 104 | 3,432 | 3,579 | 3,231 | 3,028 | 22,050 | 22,879 | 15.76 | 15.42 | 76.03 | 73.89 | 13.82 | 12.27 |
| High | 3 | 0 | 4,730 |  | 5,031 |  | 147,996 |  | 3.19 |  | 100 |  | 3.40 |  |
| *Pre-Post <br> ${ }^{\text {a }}$ Mean bu <br> Table exc | ant at cases 4 order | 05. <br> Earnin <br> nd 256 | \$1000 to 2004 ord | xclude with m | values. <br> RD inco |  |  |  |  |  |  |  |  |  |

and adjudicated paternities, but the increases are not significant. This occurs despite a significant decline in mean earnings for low-income payers in both types of paternity cases. Mean earnings also decline for low-income payers in divorce cases, although this decrease is not significant. The effect of the increased payment and declining earnings yields a substantial increase in mean payment burden for low-income payers, and the increases are statistically significant for divorce and voluntary paternity cases.

There are no statistically significant changes among medium- or high-income payers. Most divorce and voluntary paternity cases fall into the medium-income category; most adjudicated paternity cases are in the low-income category. Consequently, for the majority of divorce and voluntary paternity cases, there is little evidence of any impact associated with the modified guidelines.

Table 3 disaggregates the samples by county groups, using the same classifications (based on a "Beale-code" urban-rural continuum ${ }^{15}$ ) as was used in the Rothe et al. (2007) paper. Again because of the importance of the type of case, Table 3 uses the same breakdown as did Table 2. Outcomes are shown separately for divorce, voluntary paternity and adjudicated paternity.

Disaggregating by county groups does not provide much additional information. Although there are changes in the pre- and post-January 1, 2004 divorce groups, none is significant. Among adjudicated paternity cases, mean earnings for Milwaukee payers decline significantly. Because the mean payment amount is essentially unchanged, the mean payment burden increases significantly. There are no significant changes for other urban/rural groupings.

For voluntary paternity cases, significant declines occurred in earnings for payers in the small urban and rural counties. These declines are the only significant changes for payers in this type of case. Overall, the disaggregation of cases by urban/rural grouping appears to verify the relative lack of change between orders set before and after January 1, 2004.

[^8]

These descriptive tables appear to show that, for most non-custodial fathers, relatively little change in payment outcomes occurred in orders set before and after January 1, 2004, with the possible exception of low-income payers. Because low-income payers were a target group in the revision of the guidelines, we turn next to a series of regression models to attempt to determine how other factors may be affecting the payment measures shown in the descriptive tables. The next section controls simultaneously for a variety of these changes in an effort to better isolate the intervening factors.

## $\underline{\text { Regression Models }}$

To address concerns that differences in the descriptive outcomes may reflect differences in the characteristics of the pre- and post-January 1,2004 , samples, Table 4 shows regressions that allow an examination of the relationship between case characteristics and child support outcomes while holding the other characteristics constant.

Regression models are presented for five outcomes measured over the year after the order was set: the amount of child support owed by a non-custodial father, the amount of child support paid, father earnings, father compliance levels (how much of his order was paid), and the burden of child support obligations (how much of father earnings were owed in current support). ${ }^{16}$

On the left hand side of the table is the list of explanatory variables which are used in each model. Under the heading for each outcome are two columns; the left-hand column (titled "Coeff.") displays the coefficient from the regression model for that explanatory variable, indicating how each variable is related to the outcome. A positive coefficient indicates that individuals with this characteristic tend to have a higher result in the outcomes; negative coefficients show they tend to have a lower result. Figures in bold are different from zero by a statistically significant amount.

In the first panel, orders that were set after January 1, 2004, when the guidelines changed, are no different from those set before. We would have expected the new guidelines to have resulted in lower

[^9]Impact of Deviation from Child Support Guidelines on Child Support Outcomes and Income

|  | Logged Annual Child Support Owed Amounts in 2003 dollars |  | Logged Annual Child Support Payments in 2003 dollars |  | Logged Annual Earnings in 2003 dollars |  | Logged Compliance (Paid/Owed Amt) |  | Logged Burden (Order/Earnings) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Coeff. | S.E. | Coeff. | S.E. | Coeff. | S.E. | Coeff. | S.E. | Coeff. | S.E. |
| Time Period (compared to Pre-2004) |  |  |  |  |  |  |  |  |  |  |
| 2004 and later | 0.028 | 0.138 | -0.089** | 0.029 | -0.062* | 0.027 | 0.050 | 0.079 | -0.004 | 0.030 |
| Deviation From Guidelines (compared to Consistent) |  |  |  |  |  |  |  |  |  |  |
| Below Guideline | -0.280 | 0.214 | -0.268** | 0.046 | -0.053 | 0.043 | -0.031 | 0.123 | -0.286** | 0.037 |
| Above Guideline | -0.017 | 0.265 | 0.182** | 0.056 | -0.174** | 0.053 | -0.110 | 0.152 | 0.281** | 0.048 |
| Missing | -1.943** | 0.344 | 0.115 | 0.073 | -0.362** | 0.068 | -1.235** | 0.197 | 0.045 | 0.062 |
| Case Type (compared to Divorce) |  |  |  |  |  |  |  |  |  |  |
| Adjudicated Paternity | -0.350 | 0.285 | -0.155* | 0.060 | -0.024 | 0.057 | -0.160 | 0.163 | -0.065 | 0.061 |
| Voluntary Paternity | 0.286 | 0.296 | -0.018 | 0.063 | -0.002 | 0.286 | 0.199 | 0.169 | 0.001 | 0.062 |
| Income Group At Time of Order (compared to Medium) |  |  |  |  |  |  |  |  |  |  |
| Zero | -2.990** | 0.615 | -0.111 | 0.131 | -9.061** | 0.122 | -2.086** | 0.352 |  |  |
| Low | -0.786* | 0.357 | -0.099 | 0.076 | -0.226** | 0.071 | -0.522* | 0.204 | 0.319** | 0.063 |
| High | -0.293 | 0.926 | 0.083 | 0.197 | -0.138 | 0.184 | -0.290 | 0.530 | 0.251 | 0.161 |
| Missing | -1.350** | 0.357 | -0.826** | 0.076 | -9.594** | 0.071 | -0.463* | 0.204 | 0.111 | 0.231 |
| Income |  |  |  |  |  |  |  |  |  |  |
| Income (\$2003) | 0.000** | 0.000 | 0.000** | 0.000 | 0.000** | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 |
| Income Squared (\$2003) | 0.000 | 0.000 | 0.000** | 0.000 | 0.000** | 0.000 | 0.000 | 0.000 | 0.000** | 0.000 |
| Age of Youngest Child (compared to 0-2) |  |  |  |  |  |  |  |  |  |  |
| 3-5 | -0.689** | 0.192 | 0.012 | 0.041 | -0.018 | 0.038 | -0.413** | 0.110 | -0.008 | 0.040 |
| 6-8 | -0.256 | 0.256 | 0.084 | 0.054 | 0.109* | 0.051 | -0.170 | 0.146 | 0.020 | 0.056 |
| 9 or higher | -0.281 | 0.228 | 0.134** | 0.048 | 0.007 | 0.045 | -0.203 | 0.131 | 0.087 | 0.048 |
| Number of Children (compared to 1) |  |  |  |  |  |  |  |  |  |  |
| 2 | -0.080 | 0.183 | 0.400** | 0.039 | -0.044 | 0.036 | -0.212* | 0.105 | 0.443** | 0.038 |
| 3 | -0.201 | 0.284 | 0.591** | 0.060 | 0.044 | 0.056 | -0.391* | 0.162 | 0.573** | 0.056 |
| County (compared to Milwaukee County) |  |  |  |  |  |  |  |  |  |  |
| Large Metro | 0.995** | 0.196 | 0.194** | 0.042 | 0.002 | 0.039 | 0.554** | 0.112 | 0.031 | 0.040 |
| Small Metro | 1.329** | 0.181 | 0.135** | 0.038 | 0.005 | 0.036 | 0.735** | 0.103 | -0.016 | 0.038 |
| Rural | 1.774** | 0.230 | 0.241** | 0.049 | 0.090 | 0.046 | 1.003** | 0.131 | 0.009 | 0.047 |
| Order Type (compared to Stipulated by Parties) |  |  |  |  |  |  |  |  |  |  |
| Judge Revised Stipulation | 0.029 | 0.516 | -0.086 | 0.110 | 0.456** | 0.103 | 0.059 | 0.295 | -0.118 | 0.095 |
| Judge Set Order | -0.643** | 0.207 | -0.058 | 0.044 | -0.025 | 0.041 | -0.416** | 0.118 | 0.019 | 0.044 |
| Legal Representation (compared to Neither) |  |  |  |  |  |  |  |  |  |  |
| Only Mother | 0.227 | 0.233 | 0.079 | 0.050 | -0.014 | 0.046 | 0.103 | 0.133 | 0.083 | 0.047 |
| Only Father | 0.215 | 0.373 | -0.098 | 0.079 | 0.282** | 0.074 | 0.259 | 0.213 | -0.096 | 0.073 |
| Both Parents | 0.754** | 0.240 | 0.043 | 0.051 | 0.024 | 0.048 | 0.421** | 0.137 | 0.089 | 0.049 |
| Constant | 6.423** | 0.421 | 7.272** | 0.089 | 9.253** | 0.084 | 3.908** | 0.241 | 2.731** | 0.080 |

Sample: Cases with Owed Amounts $>\$ 0(\mathrm{~N}=1542)$, Burden outcomes limited to cases with earnings $>\$ 1000(\mathrm{~N}=1042)$. ${ }^{*} \mathrm{p}<.05,{ }^{*} \mathrm{p} \ll .01$
owed amounts in general (as they reduced the expected order amount for some groups and kept others the same), but as in the descriptive analysis in Table 2, once we control for the pre-post compositional differences, there is no change in the amounts owed associated with the guidelines change. ${ }^{17}$ Father's earnings and payment amounts do decline significantly in the post-change period, but the lack of any significant change in the amounts owed results in no differences in compliance rates or the burden level.

In the next panel down, the regression results show the relationship between deviations from the guidelines and each outcome. Once other characteristics of the case are taken into account, cases that received an order that deviated above or below the child support guideline do not owe significantly different amounts of child support. Even though we do not see the expected effects of guideline deviation on the amount of child support owed, we do find that orders below the guidelines pay significantly less and those above the guidelines pay more. This may reflect the selectivity of judges in reducing order amounts for those who appear less able or likely to pay and raising orders for those more likely to pay. Orders above the guidelines are associated with significantly lower levels of post-order earnings. There is no significant difference between guideline-consistent orders and above- or below-guideline orders in the father's compliance with the order. Orders about which we lack information about deviation from the guidelines at the time of the order ("Missing") have significantly lower orders, income and compliance. Unsurprisingly, the burden of above-guidelines orders is higher, and that of below-guidelines orders is lower, than for orders consistent with the guidelines.

Continuing down to the next panel, we compare orders resulting from paternity cases with those from divorce cases. Controlling for other characteristics, voluntary paternities appear no different from divorces in all outcomes. Fathers established through an adjudicated paternity process pay less, consistent with findings in previous papers. We examine the effect of father's income in two ways. Father's income group is determined by whether fathers fall in the high- or low-income group (which should have reduced

[^10]order amounts under the new rules), or in the medium income group. In addition, we add the actual amount of income and income squared to control for the fact that the average income for a father in a specific income group may be different in the post-2004 period, even after adjusting for inflation. The income-group coefficient thus indicates the effect of being in that group, whereas the income and income squared coefficients indicate the effect of additional dollars of income within the income group. The father's income group has strong effects on all of the outcomes examined, except payments. Those with income listed as low (below $\$ 950 /$ month) owe less, have lower post-order earnings, and lower compliance than those in the medium-income group. Those listed as either zero income or having missing income information in the court record have similar results, with the lowest levels of payments and post-order earnings, and lower orders and compliance rates. The differences result in a strong relationship between income and compliance; all groups have lower compliance than those in the medium group (although high income fathers' compliance is not statistically significantly lower). These effects on orders and earnings lead to statistically significantly higher burdens for those in the low income group, and higher but not statistically significant burdens for those in the high income group.

Other variables in the model appear to be related to outcomes in expected ways. Cases in counties outside Milwaukee (regardless of whether urban or rural) have fathers with higher orders and higher payments, resulting in compliance rates that increase as the level of urbanization decreases.

Orders that were set by a judge tend to be lower than those that were stipulated. Compliance by the father is lower on orders set by a judge, but these orders are not associated with lower payments burden. In addition, stipulated orders revised by a judge tend to be associated with higher earnings.

Finally, orders are higher when both parents have legal representation in the court process, as is the father's compliance with the order. Cases where the father is the only one represented tend to have higher father earnings in the year after the order is set.

## Comparison of the Effect of the Guidelines Change on Different Income Groups

The regression models in Table 4 show differences in outcomes for pre- and post-January 1, 2004, orders, controlling for the other case characteristics in the model. However, the policy was designed to have a different effect for cases in different income ranges. In particular, the change in the guidelines could have reduced child support order amounts for those with low and high incomes, and left them unchanged for those in the middle income groups. One way to examine these different expected effects is to add an interaction term in the model to allow the effect of having an order in the post-Jan 2004 period to vary across the income groups. Because cases with incomes between $\$ 950 /$ month and $\$ 7,000 /$ month should have the same recommended order both before and after January 1, 2004, we can expect that any changes that occur to outcomes for cases in this range are a result of something other than the guidelines change. By comparing the pre-post change for the low and high groups with the change for the medium (\$950-\$7,000 per month) income groups, we can say with greater confidence that these changes are associated with the change in the guidelines.

Table 5 presents the model results for pre- and post-2004 outcomes for the different income groups as derived from the model which includes interaction terms. In addition to income level and period, these models control for income amount, case type, age and number of children, county group, whether the order was stipulated or set by a judge, and which parents had legal representation in court. The low-income group is separated into those with no reported income at all, and those with at least some. ${ }^{18}$

We focus on the results from the panel depicting the interaction terms. These reflect whether there are statistically significant pre-post differences separately in each income group. We can see that the pre-post change in order amounts for the low income group is positive, compared to that for the omitted medium income group. We would have expected that the change in the guidelines would have lowered

[^11]Table 5
Comparison of Impacts of Policy Change on Different Income Levels

|  | Logged Annual Child Support Owed Amounts in 2003 dollars |  | Logged AnnualChild SupportPaymentsin 2003 dollars |  | Logged Annual Earnings in 2003 dollars |  | Logged Compliance (Paid/Owed Amt) |  | Logged Burden $\log$ (Order/Earnings) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Coeff. | S.E. | Coeff. | S.E. | Coeff. | S.E. | Coeff. | S.E. | Coeff. | S.E. |
| Time Period (compared to Pre-2004) |  |  |  |  |  |  |  |  |  |  |
| 2004 and later | -0.120 | 0.202 | 0.002 | 0.043 | 0.020 | 0.040 | -0.057 | 0.116 | -0.012 | 0.035 |
| Income Group At Time of Order (compared to Medium) |  |  |  |  |  |  |  |  |  |  |
| Zero | -3.487** | 0.865 | -0.092 | 0.183 | -9.058** | 0.172 | -2.381** | 0.495 |  |  |
| Low | -1.154** | 0.396 | -0.088 | 0.084 | -0.119 | 0.079 | -0.736** | 0.226 | 0.301** | 0.070 |
| High | -0.245 | 1.061 | 0.239 | 0.225 | -0.057 | 0.211 | -0.199 | 0.607 | 0.283 | 0.185 |
| Missing | -1.450** | 0.391 | -0.713** | 0.083 | -9.513** | 0.078 | -0.548* | 0.224 | 0.214 | 0.267 |
| Interaction Between Time Period and Income Group |  |  |  |  |  |  |  |  |  |  |
| 2004*Zero | 0.976 | 1.074 | -0.048 | 0.227 | -0.041 | 0.213 | 0.589 | 0.614 |  |  |
| 2004*Low | 0.791* | 0.372 | -0.031 | 0.079 | -0.239** | 0.074 | 0.473* | 0.213 | 0.042 | 0.065 |
| 2004*High | -0.248 | 1.173 | -0.319 | 0.248 | -0.131 | 0.233 | -0.300 | 0.671 | -0.080 | 0.204 |
| 2004*Missing | -0.030 | 0.310 | -0.243** | 0.066 | -0.109 | 0.062 | 0.045 | 0.177 | -0.395 | 0.525 |
| Deviation From Guidelines (compared to Consistent) |  |  |  |  |  |  |  |  |  |  |
| Below Guideline | -0.271 | 0.215 | -0.274** | 0.046 | -0.058 | 0.043 | -0.020 | 0.123 | -0.283** | 0.038 |
| Above Guideline | -0.044 | 0.266 | 0.167** | 0.056 | -0.175** | 0.053 | -0.124 | 0.152 | 0.283** | 0.048 |
| Missing | -1.815** | 0.348 | 0.121 | 0.074 | -0.392** | 0.069 | -1.163** | 0.199 | 0.052 | 0.063 |
| Case Type (compared to Divorce) |  |  |  |  |  |  |  |  |  |  |
| Adjudicated Paternity | -0.380 | 0.285 | -0.151* | 0.060 | -0.018 | 0.057 | -0.178 | 0.163 | -0.066 | 0.061 |
| Voluntary Paternity | 0.278 | 0.297 | -0.003 | 0.063 | 0.003 | 0.059 | 0.191 | 0.170 | 0.002 | 0.062 |
| Income |  |  |  |  |  |  |  |  |  |  |
| Income (\$2003) | 0.000** | 0.000 | 0.000** | 0.000 | 0.000** | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 |
| Income Squared (\$2003) | 0.000* | 0.000 | 0.000** | 0.000 | 0.000** | 0.000 | 0.000 | 0.000 | 0.000** | 0.000 |
| Constant | 6.467** | 0.426 | 7.235** | 0.090 | 9.226** | 0.085 | 3.935** | 0.244 | 2.730** | 0.081 |

the owed amount for the low income group, but this serves as further confirmation that judges are not yet using the 2004 guidelines for this group. Interestingly, the payment compliance for the low-income fathers does increase more than for the medium income group, so the desired outcome of improving lowincome fathers' compliance does appear to be occurring, though it does not appear to be due to relatively lower order amounts or lower burdens. There are no significant interaction effects for the high income group, indicating that the desired outcomes of the guidelines change for this group have also not yet been achieved.

Other coefficients in the model are largely the same and do not appear greatly affected by the introduction of the interaction term. The straight pre-post difference in child support payments is no longer statistically significant, indicating that this effect in the original model is not found in the medium income group.

Only the prediction that lower burdens would result in the goal of improved compliance in paying obligations (and that only in the lower income group) seems confirmed by the interaction model, and even this effect is not accompanied by the expected precursors of lower order amounts and lower burdens. Of course, if it is true that judges are not adjusting orders for low and high income groups as the guidelines change suggests, then it is not surprising that we do not find the expected effects on child support outcomes.

## V. CONCLUSION

One of the premises of the changes that Wisconsin made to its child support guidelines in January 2004 was that the recommended share of income being devoted to child support under the older guidelines presented a burden to low- and high-income groups that could reduce noncustodial parents' willingness or ability to comply with their obligation. By reducing the recommended level of obligation for these parents, the state hoped to increase parental compliance.

As found in the previous paper by Rothe et al. (2007), there is scant evidence that courts have changed their methods for setting orders in the ways envisioned by the guidelines revision. This report
finds that, among all cases with an order, the median burden of orders relative to earnings has increased in models that account for changes in the distribution of cases. The final analysis (including interaction terms for changes over time by income group) finds increases in the compliance rate for lower-income cases, cases which are the anticipated target of the guidelines change, but does not find other expected results of the guidelines changes, such as lower orders and lower burdens for the low and high income groups. In fact, if anything, the final analysis finds indications of higher orders for the lower-income group. Given the lack of adoption by courts of the guideline recommendations, it is not too surprising that the expected outcomes of the new guidelines have not, for the most part, occurred.

It may still be that the guidelines revisions will have the intended effects if courts decide to adopt the newer guidelines. Recent discussion with child support officials suggests, however, that courts may be adjusting child support orders to accommodate other concerns, particularly the costs of health care and health insurance. Future federal regulation is expected to require states to make such accommodations in their guidelines.

In this paper, and its predecessor, the authors find that courts have not made changes in orders that would have been suggested by the January 1, 2004, guidelines (to reduce the burden of required child support payments for low- and high-income payers), and that burdens have increased for some payers. Many factors may be in play: slowness to adopt new permissive guidelines; concern about other child costs, such as health insurance or child care; changing composition of sole- and shared-placement cases, and other factors. The state of the practice of setting child support orders appears to be in flux, with competing demands to both lower burden (to adhere to the new, permissive guidelines) and raise payments (to cover other costs). Future research should continue to track how courts are using the guidelines, how other costs are being treated, and whether any of these changes affect parental relationships and interactions with children, as was hoped for by those advocating changes in state child support guidelines.

## References

Bartfeld, J., and D. R. Meyer. 1993. "Are There Really Deadbeat Dads? The Relationship Between Ability to Pay, Enforcement, and Compliance in Nonmarital Child Support Cases." Institute for Research on Poverty, Discussion Paper \#994-93. Madison: University of Wisconsin-Madison.

Bergmann, B., and S. Wetchler. 1995. "Child Support Awards: State Guidelines vs. Public Opinion." Family Law Quarterly 29(3): 483-493.

Coleman, M., L. H. Ganong, T. Killian, and A. K. McDaniel. 1999. "Child Support Obligations: Attitudes and Rationale." Journal of Family Issues 20: 46.

Department of Workforce Development. 2002. Child Support Guidelines Review Advisory Committee Report to Department of Workforce Development. Madison: State of Wisconsin, Department of Workforce Development.

Hu, M., and D. R. Meyer. 2003. "Child Support Orders and Payments: Do Lower Orders Result in Higher Payments?" Report prepared for the Wisconsin Department of Workforce Development. Institute for Research on Poverty. Madison, WI: University of Wisconsin-Madison.

Lin, I-F., and S. McLanahan. 2007. "Parental Beliefs About nonresident Fathers' Obligations and Rights." Journal of Marriage and Family 69(May 2007): 382-398.

Meyer, D. R., and J. Bartfeld. 1996. "Compliance with Child Support Orders in Divorce Cases." Journal of Marriage and Family 58(1, February): 201-212.

Meyer, D. R. 1999. "Compliance with Child Support Orders in Paternity and Divorce Cases." In The Postdivorce Family, R. A. Thompson and P. R. Amato, eds. Thousand Oaks: Sage Publications, Inc.

Rothe, I. E., J. L. Noyes, L. Wimer, and A. Yom-Tov. 2007. "The Compliance of New Wisconsin Child Support Orders with the Guidelines: Pre- and Post-2004." Report prepared for the Wisconsin Department of Workforce Development. Institute for Research on Poverty. Madison: University of Wisconsin-Madison.

Schaeffer, N. 1990. "Principles of Justice in Judgments about Child Support." Social Forces 69(1): 157179.


[^0]:    ${ }^{1}$ Among these fathers with very low incomes, compliance declines when the burden exceeds 15 percent of income.

[^1]:    ${ }^{2}$ See Department of Workforce Development (2002).
    ${ }^{3}$ Some research has been done on perceptions of fairness in regard to child support obligations. See, e.g., Schaeffer (1990); Bergmann and Wetchler (1995); Coleman, et al. (1999); Lin and McLanahan (2007). These authors postulate that parents may be more likely to pay child support if the amount ordered is perceived as fair, and then attempt to assess what is meant by "fair."

[^2]:    ${ }^{4}$ The 21 counties are Calumet, Clark, Dane, Dodge, Dunn, Green, Jefferson, Juneau, Kewaunee, Marathon, Milwaukee, Monroe, Oneida, Ozaukee, Price, Racine, Richland, St. Croix, Sheboygan, Waukesha, and Winnebago.

[^3]:    ${ }^{5}$ Reports of earnings data are not required for workers who are self-employed, employed by the federal government or other exempt organizations, or by multistate companies that do not report wage records to Wisconsin. Earnings that occur in other states or that occur off-the-books will probably also not appear in the UI data. Earlier estimates of "covered" workers suggest that about 91 percent of all Wisconsin employees should have their earnings reported to the state.

[^4]:    ${ }^{6}$ There were 213 cases with zero or missing UI income for the full year; for these cases we imputed annual income from information contained in the CRD. There are an additional 274 cases which had no income information in either the CRD or from the UI Wage Record; for these orders we assigned an annual income of $\$ 0$. There were also 452 cases with one quarter of missing UI Wage Record data (and no CRD data); in these cases, we set income in the missing quarter(s) to $\$ 0$ and summed over the remaining three quarters to obtain an annual income.
    ${ }^{7}$ These additional payments may be going to arrears or past support payments.
    ${ }^{8}$ Analysis indicated that this was the minimum cut off which eliminated cases showing burdens over 5 times earnings. Sensitivity testing of other cutoffs (\$500 and \$2000) showed no differences in conclusions regarding pre-post differences.

[^5]:    ${ }^{9}$ After the CRD sample is collected, it is weighted so that the cases in our sample reflect the proportion of different types of cases as they occur in the actual child support caseload in the 21 CRD counties. For our analysis, we have chosen to weight the sample in a way that maintains roughly the same case count as the actual number of collected cases. We do this so that tests of statistical significance are not affected by artificially increased caseload sizes.

[^6]:    ${ }^{10}$ No orders in voluntary paternity cases took more than 52 weeks from petition date to order date; in contrast, 55 orders in divorce cases and 27 orders in adjudicated paternity cases took more than 52 weeks from petition date to order date. Payment and earnings measures for orders that took longer than 52 weeks do not vary significantly from those for orders taking less than 52 weeks. We have no evidence that these delayed cases represent a strategic effort by payers to obtain a more favorable order by waiting for the new guidelines to take effect.

[^7]:    ${ }^{11}$ Another possible explanation for the stability of amounts owed and paid in divorce cases is that Rothe et al. (2007) finds that orders in divorce cases were sometimes set higher than the new guidelines after January 1, 2004.
    ${ }^{12}$ Even the very large difference between the pre-and post-mean burden for divorce cases in the entire sample is not statistically significant. This large difference results from very high burdens that result for those payers with very low incomes and high orders. This apparent wide variation is eliminated once those with earnings $\leq \$ 1000$ are removed from the sample.
    ${ }^{13}$ To establish income at the time the order is set, we use only income data from the CRD.
    ${ }^{14}$ This eliminates the distortion caused by the presence of a few cases with extremely (and unrealistically) high burdens.

[^8]:    ${ }^{15}$ Beale Codes are available on the U.S. Department of Agriculture web site at: http://www.ers.usda.gov/Data/RuralUrbanContinuumCodes/2003/

[^9]:    ${ }^{16}$ The models for all outcomes use the logged outcome to account for the long tails in the distribution of outcomes. The long tails may bias the results of the regression if not corrected by use of a log-transformation.

[^10]:    ${ }^{17}$ This agrees with the finding in Rothe et al. (2007) that many judges do not appear to have taken the permissive income-specific recommendations in the guidelines into account in this early post-2004 period.

[^11]:    ${ }^{18}$ This is due to the concern that those fathers with zero reported income may reflect situations where the court had no information about the father's actual income.

