

# Intended and Unintended Consequences of Prison Reform\*

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October 2009

## Abstract

Since the 1970s, U.S. federal courts have issued court orders condemning state prison crowding. However, the impact of these court orders on prison spending and prison conditions is theoretically ambiguous because it is unclear if these court orders are enforceable. We examine states' responses to court interventions and show that these interventions generate higher per inmate incarceration costs, lower inmate mortality rates, and a reduction in prisoners per capita. If states seek to minimize the cost of crime through deterrence, an increase in prison costs should lead states to shift resources from corrections to other means of deterring crime such as welfare and education spending. However, we find that court interventions, that are associated with higher corrections expenditures, lead to lower welfare expenditures. This suggests that the burden of increased correctional spending is borne by the poor. Furthermore, states do not increase welfare spending after their release from court order; making the reduction in welfare spending permanent. Thus, our results suggest that states do not respond to prison reform in the manner prescribed by the deterrence model. States' responses to prison reform are most consistent with the predictions in the empirical public finance literature that indicate stickiness in expenditure categories and that increases in spending in programs that affect the poor generate declines in expenditures in other program that are also targeted to the poor.

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<sup>†</sup>We would like to thank Duha Altindag for excellent research assistance. Jonah Rockoff, Francesco Drago, Christian Traxler, and seminar participants at Rice University, the 2009 NBER Summer Institute, and the First Bonn & Paris Workshop on Law and Economics provided valuable comments.

# 1 Introduction

The United States federal courts have ordered state officials to improve various dimensions of the operations of schools, prisons, and mental hospitals. However, the enforceability of these court orders is limited by the Eleventh Amendment of the U.S. constitution which provides states with immunity in federal court.<sup>1</sup> To get around the Eleventh Amendment, federal cases name specific state officials as defendants, rather than the state, but it is difficult to enforce court orders that require additional spending against state officials since most state constitutions forbid disbursements from the state treasury except by legislative appropriation (Hirschhorn, 1984). If the state government is reluctant to appropriate the necessary funds to improve the quality of the services provided by an institution (such as schools or prisons) the federal court can respond by closing the institution, but judges may be unwilling to take such drastic measures. Furthermore, orders to close institutions may be reversed on appeal (Hirschhorn, 1984). Thus, it is unclear theoretically whether federal court orders requiring additional state expenditures are enforceable.

The empirical evidence on the issue is ambiguous. For example, federal court orders that aim to improve prison conditions have received significant attention, but the extent to which these court orders increase correctional expenditures is disputed (Harriman and Straussman, 1983; Taggart, 1989; and Fliter, 1996), although Levitt (1996) shows that these court orders reduce prison population growth. Even if such federal court orders were fully enforceable, their impact on the provision of the services targeted by the court order as well as on other services provided by the states would depend on how the states choose to finance the additional expenditures that would

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<sup>1</sup>The Eleventh Amendment states that “The Judicial power of the United States shall not be construed to extend to any suit in law or equity, commenced or prosecuted against one of the United States by Citizens of another State, or by Citizens or Subjects of any Foreign State.”

emerge as a consequence of the court order.

A number of researchers have examined the federal court orders from a normative perspective. For example, federal court orders to reform schools, prisons, and mental institutions have been criticized as undemocratic (Sandler and Schoenbrod, 2004). Others have pointed out that the state political process gives little weight to the disadvantaged. For instance, prisoners' rights are less likely to be protected by the states since inmates are not allowed to vote. Thus, it has been argued that federal courts should be given authority over expenditures for the disadvantaged to balance out the fact that the disadvantaged have little influence in the state political process (Rose-Ackerman, 2003).

Although the intended consequence of federal court interventions is to enforce the constitutional and statutory rights of disadvantaged groups, it is possible that an unintended consequence is the decline in funds allocated to other disadvantaged groups as a consequence of the additional expenditures that have to be incurred by the states to comply with these court orders. A related example is the case of the U.S. Congress which can force states to spend more on groups of individuals by making it a condition to continue receiving federal grants (Rosenthal, 1987). Baicker (2001) finds that federally-mandated increases in medicaid spending lead to increases in medicaid spending at the expense of other state welfare spending. Similarly, Baicker and Gordon (2006) examine *state* Supreme Courts orders to equalize spending across school districts. They find that these orders increase state aid to localities for education at the expense of aid for public welfare, health, hospitals, and general services. Thus, if federal court orders are enforceable, it is plausible that the resources used to satisfy the court order come from other disadvantaged groups.

In this paper, we examine the impact of federal court orders to improve prison conditions. Specifically, we investigate whether federal court orders did indeed im-

prove prison conditions, whether they impacted state expenditures on corrections, and if and how states re-allocated resources in reaction to these court orders.

Since 1970, federal court interventions have affected such dimensions of prison operations as staffing, the amount of space per inmate, medical and mental health care, food, hygiene, sanitation, disciplinary procedures, conditions in disciplinary segregation, exercise, fire safety, inmate classification, grievance policies, race discrimination, sex discrimination, religious discrimination and accommodations, and disability discrimination and accommodations (Schlanger, 2006). In 1995, state attorneys general successfully lobbied Congress to pass the Prison Litigation Reform Act (PLRA) so that they could regain control over prisons (Wharton, 1996). The PLRA ended federal court supervision over several state correctional systems and made any further court intervention more difficult (Schlanger, 2006). Sullivan (2000) reports the deterioration of Tennessee prisons after their release from federal court supervision.<sup>2</sup> Nonetheless, federal courts still order states to increase state correctional expenditures. For instance, a panel of federal judges just ordered the California prison system to drastically increase prison expenditures or reduce its inmate population by 150,000 within two years (Moore, 2009).

We find that following federal court orders, prison conditions improved, prison costs per inmate increased, and per capita spending on welfare decreased. Thus, our results suggest that federal court can increase state expenditures but that it is likely that the resources used to finance these additional expenditures come from other disadvantaged groups. Our results follow from a difference-in-differences methodology. Thus, our results denote changes relative to a comparison group of states. For instance, welfare expenditures may have increased following a court order but not as

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<sup>2</sup>Specifically, Wharton (1996) underlines the decrease in the correctional staff and increase in the number of violations of regulations governing mental health, fire safety, occupational safety, and hazardous materials.

much as welfare expenditures in the control group of states.

Federal court orders to improve prison conditions are expected to reduce the deterrent effect of imprisonment,<sup>3</sup> and a large literature suggests that outlays on social welfare and education are substitutes for corrections in combating crime.<sup>4</sup> Thus, if states seek to deter crime, we expect an increase in state spending on social welfare and/or education following federal court intervention.

Contrary to our expectation we find the court orders, which are associated with an increase in correctional spending, did not alter education spending, but generated a decrease in welfare spending. We provide two related explanations for these findings. First, it is possible that spending in various budget categories is “sticky.” Following a court order to improve prison conditions, per capita corrections expenditures go up despite the decline in inmates per capita. If states experience higher crimes rates following a short-run reduction in the prison population, it may be infeasible to maintain a lower imprisonment rate. In general it may be difficult for the state to change the long-run level of the imprisonment rate given that it is affected by the decision of so many independent parties (state legislature, police, prosecutors, judge, juries, parole boards, and probation officers). If expenditures on corrections are “sticky,” corrections expenditures will remain at a higher level even after the state has had enough time to adjust. Thus, given the budget constraints faced by the state,

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<sup>3</sup>This is because, we find evidence in this paper that court intervention reduces prison deaths, and Katz et al. (2003) show that a reduction in prison death rates leads to higher crime rates. Thus, an improvement in prison conditions through court intervention implies a reduction in deterrence. Furthermore, we document in this paper that court orders reduce per capita prisoners in the state. Levitt (1996) shows that court orders impact the growth of prison population, which in turn influences the crime rate. Thus, the reduction in prison population due to court intervention is another avenue through which the court interventions may have reduced deterrence.

<sup>4</sup>For instance, Donohue and Siegelman (1998) argue for the effectiveness of preschool and early childhood education, family-based therapy, and job training as a crime control device. Corman and Mocan (2000, 2005), Mocan and Bali (forthcoming), Gould et al. (2002) and Lin (2008) provide evidence that local unemployment, wages and poverty have an impact on criminal activity, implying that education and training help combat crime. Lochner and Moretti (2004) demonstrate the impact of education on criminal activity.

a permanent increase in corrections expenditures would have a negative impact on the provision of all services, including welfare services. Second, policy makers may consider expenditures on various programs that affect the poor as substitutes. Given that court orders increase the cost of punishing criminals, to the extent that policy makers perceive criminals as being members of low-income groups, they may decide to decrease in welfare payments, rather than to reduce other spending items, such as transportation.<sup>5</sup>

Section 2 discusses prison litigation. Section 3 describes the data. Section 4 explains our empirical methodology and Section 5 presents the results.

## 2 Prison litigation

### 2.1 Background and prior research

Prior to the 1960s federal and state courts almost invariably refused to hear cases regarding prison conditions (Bleich 1989; Schlanger 1999). In 1963, the Supreme Court held that inmates could employ the writ of *habeas corpus* to contest their conditions of incarceration.<sup>6</sup> During the mid to late 1960s, courts intervened on narrow issues. For instance, the courts prohibited guards from using two torture devices on prisoners (the crank telephone and the teeter board) and “the application of any whipping to the bare skin of prisoners.”<sup>7</sup> In the 1970s, the federal courts took a much more activist stand. The prison systems in several states were ruled

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<sup>5</sup>Baicker (2001) finds that federally-mandated increases in medicaid spending lead to increases in medicaid spending at the expense of other state welfare spending. Further, she finds the effect to be larger with greater racial differences. Similarly, Baicker and Gordon (2006) examines *state* Supreme Courts orders to equalize spending across school districts. They find that these orders increase state aid to localities for education at the expense of aid for public welfare, health, hospitals, and general services. Court order to spend additional resources on prisons have occurred in some of the states with the greatest racial differences. Thus, if federal court orders are enforceable, it is plausible that the resources used to satisfy the court order come from other disadvantaged groups.

<sup>6</sup>*Jones v. Cunningham*, 371 U.S. 236 (1963).

<sup>7</sup>*Jackson v. Bishop*, E.D. Ark., 268 F. Supp. 804 (1967).

unconstitutional, and the courts enacted sweeping remedies based on the totality of prison conditions. Federal court intervention narrowed in scope in the 1980s. As described by Fliter (1996) and Schlanger (2006), this could be because the lawsuits in the 1970s made states more aware of legal liabilities, and many states created dispute resolution mechanisms to address grievances; and it could also be due the appointment of conservative judges to the federal bench by Republican administrations (Schlanger, 2006; Epstein et al., 2007). Finally, in 1995 Congress passed the Prison Litigation Reform Act which made existing court orders harder to sustain and new ones harder to obtain (Schlanger, 2006).

Three previous studies have examined the impact of court orders on prison conditions. Harriman and Straussman (1983), Taggart (1989) and Fliter (1996) provide contradictory evidence on whether court orders have influenced state spending on correctional facilities. These studies limited their analyzes to total corrections expenditures and thus did not examine the impact of federal intervention on the number of state prisoners, corrections expenditures per prisoner, or corrections expenditures per capita. Further, these earlier studies did not employ panel data, and instead examined corrections expenditures one state at the time, for the states in which the federal courts intervened. Thus, the observed increase in corrections expenditures in the litigated states may have been caused by overall national trends in corrections expenditures. In contrast, Levitt (1996) examined a panel of all states for the years 1972 through 1993 and court orders that span the years 1971 through 1992. He reported that prison litigation had a short-run effect on the growth rate of prison population.<sup>8</sup>

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<sup>8</sup>Our paper is also related to Murray, Evans and Schwab (1998), who analyze the impact of state education-finance reforms ordered by *state* courts on within-state inequality in education spending.

### 3 Data

Following Levitt (1996), we consider a state under court order if all correctional facilities of the state came under court order. These “Litigated States” and the date in which the state’s correctional system came under court order, and the date of release are displayed in Table 1. We used the information at the Civil Rights Litigation Clearinghouse to reconcile the small discrepancies in year and litigated status among the prior studies (Taggart, 1989; Fliter, 1996; Levitt, 1996).<sup>9</sup>

We investigate the impact of court orders on prison spending, prison mortality, welfare expenditures, education expenditures, transportation expenditures, state and local police expenditures as well as local jail expenditures. We define welfare expenditures as all state expenditures on cash assistance to individuals, and other welfare payments. Cash assistance to individuals includes AFDC/TANF and assistance programs not under federal categorical programs (e.g., general assistance, refugee assistance, home relief, and emergency relief). Other welfare payments include the administration of medical and cash assistance, general relief, vendor, nursing homes and welfare institutions owned and operated by a government, and other welfare programs. With one exception, all welfare data are obtained from the Bureau of the Census. The measure for vendor payments from the Bureau of the Census does not include payments to public hospitals. For this reason, vendor payments data are obtained from the Bureau of Economic Analysis.

Because we are interested in the effect of court intervention on the yearly cost of incarceration, we examine corrections operating expenditures.<sup>10</sup> We also analyze

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<sup>9</sup><http://clearinghouse.wustl.edu>. The correct data for when the state Alabama was released from court order is obtained from “U.S. Relinquishes Alabama Prisons; Dismissing 17-Year Lawsuit,” *New York Times*, January 15, 1989, p. 17.

<sup>10</sup>In 1992, more than three-quarters of the operating expenditures went to labor compensation (salaries, wages, and benefits), while the rest was devoted to the purchase of supplies, contract services, and the like. (Alexis M. Herman and Katharine G. Abraham, *Measuring State and Local*



the reaction of corrections capital outlays to court orders. Data for state financial variables are obtained from U.S. Census Bureau, *Annual Survey of State Government Finances and Census of Governments*. All financial variables are converted in real (2007) dollars using the consumer price index.

We follow Katz, Levitt, and Shustorovich (2003) in using prison deaths as a proxy for prison conditions. Courts have used prison deaths as a proxy for prison conditions as recently as February 2009, when federal judges found prison conditions in California so poor that inmates die regularly of suicides and lack of proper care (Thompson, 2009).<sup>11</sup> The prison mortality rate is computed as prison deaths per 1,000 state prisoners. Because of data limitations, the prison mortality is not adjusted for age, gender, or race of prisoners. Data on prison population and prison deaths are obtained from Donohue and Wolfers (2005), and updated using data from the Bureau of Justice Statistics.<sup>12</sup>

We also control for real income per capita, the proportion of female-headed households, the poverty rate, state unemployment rate, percentage of the state population that is black, percentage of the state population residing in urban areas, and variables gauging the age distribution in the state. Income per capita data are obtained from the Bureau of Economic Analysis. We followed Berry, Fording and Hanson (2003) methodology to calculate the proportion of female-headed households in each state until the year 2000. We used the poverty rate data reported by the same authors for the period of 1960-1990 and the data provided by the census for the period 1980-2007 to create a consistent poverty rate series.<sup>13</sup> The unemployment rate is defined as

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Government Labor Productivity: Examples from Eleven Services, U.S. Department of Labor, June 1998.)

<sup>11</sup>In response to these conditions the court ruled that California must release tens of thousand of inmates to relieve overcrowding.

<sup>12</sup>The data can be downloaded at <http://bpp.wharton.upenn.edu/jwolfers/DeathPenalty.shtml>.

<sup>13</sup>Data source is ICPSR, study number 1294.

the insured unemployment rate.<sup>14</sup> State-and-year specific age and race distribution is calculated using information from the Center for Disease Control and the Bureau of the Census. The proportion of state population residing in urban areas is calculated using census data. Regressions also include a variable gauging the ideology of the state's citizens, created by Berry et al. (1998).<sup>15</sup> A higher value of this index signifies more liberal ideology.

Table 2 presents summary statistics for the years 1961 through 2000. The average real spending is about \$34,300 per prisoner for operating expenditures and \$4,500 for capital expenditures. Per capita state spending on welfare is \$722. Average inmate-population ratio is 1.78 per 1,000 residents, and average prison death rate is 2.9 deaths per 1,000 inmates, which translates into 27 deaths per year for the average state. On average there are 0.1 inmates per 1,000 residents who are held in local jails (rather than state prisons) due to prison overcrowding.

## 4 Empirical methodology

In Figure 1 we display the ratio of corrections expenditures in litigated states to corrections expenditures in non-litigated states. To account for differences in wealth among states, expenditures are normalized by state income per capita, and they are deflated by the number of inmates and by the state population. The behavior of this ratio as a function of the timing of the court order is informative. The horizontal axis displays the time periods (in years) relative to the year in which the court order was issued to the litigated state. For example, four years prior to the court order, litigated states spent about 72% per inmate of what was spent by the non-litigated

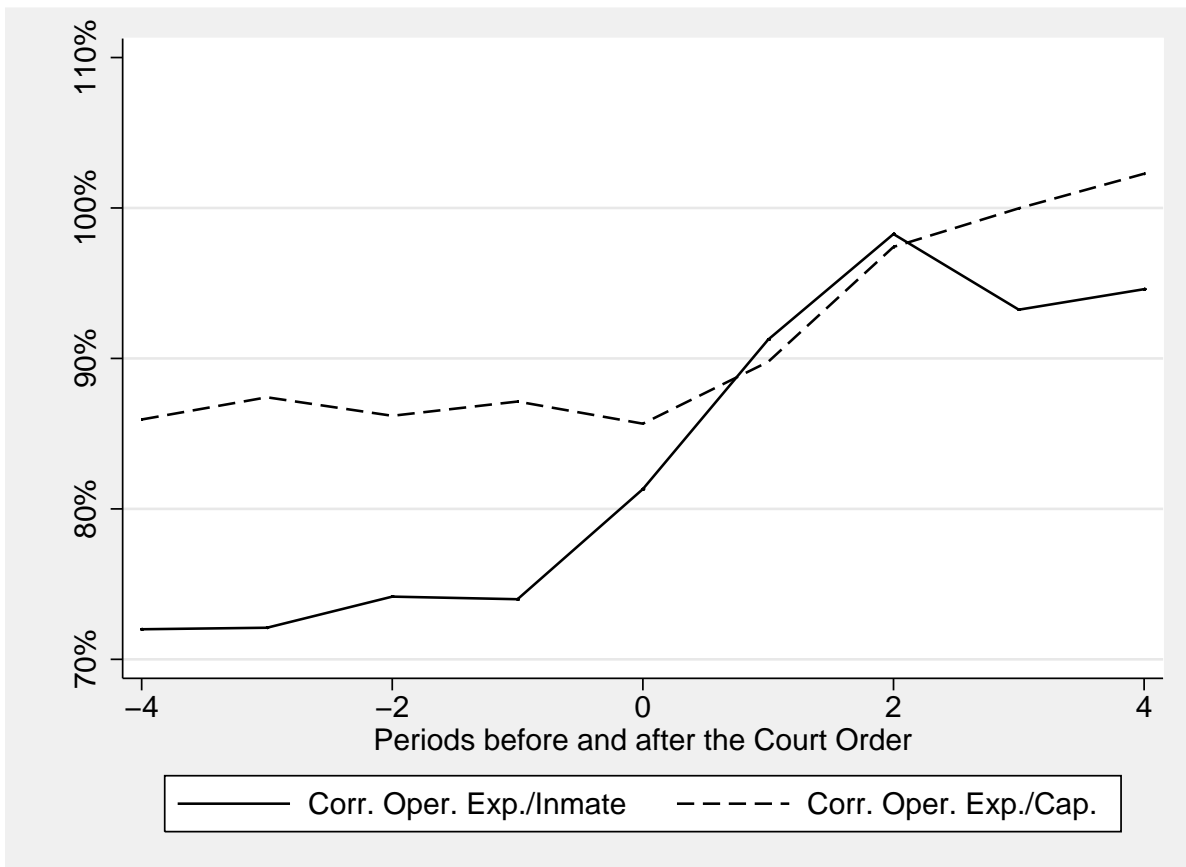
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<sup>14</sup>The data for the years 1960-2000 are obtained from Donohue and Wolfers (2005). The values for 2001-2006 are calculated using state-specific weekly unemployment insurance claims information obtained from the U.S. Department of Labor.

<sup>15</sup>Updated values of the measure are available at ([http://www.uky.edu/~rford/Home\\_files/page0005.htm](http://www.uky.edu/~rford/Home_files/page0005.htm)).

states. When the time period is zero (the year in which the court order was issued) the ratio jumps to about 87%; it reaches 102% two years after the court order and levels off. Thus, Figure 1 suggests that court intervention leads to higher corrections expenditures per inmate.

Figure 1: Corrections Operating Expenditures in Litigated States as a Percentage of Corrections Operating Expenditures in Non-Litigated States (all expenditures are normalized by income per capita)



An ideal strategy to identify the impact of the court orders, however, would involve randomly assigning court orders to states and observing the differences in outcomes between states that received these court orders and states that did not. In fact, the eight out of twelve litigated states are in the south and thus the assignment of court orders is far from random. In the absence of such an experiment, we follow Angrist

and Lavy (2001), Ashenfelter and Card (1985), and Freeman (1984) in assuming that while there are differences between states which received and did not receive court orders, these differences are fixed over time (after controlling for income per capita). Furthermore, the courts do not react to short-term variations in prison conditions when imposing the court orders. Specifically, court orders are not issued in reaction to transitory deteriorations in prison conditions; rather prison litigation and court orders emerge in reaction to prison conditions that would remain dire if it were not for court intervention. The graph in Figure 1 supports this statement. There is *no drop* in per inmate corrections spending in litigated states relative to non-litigated states before a court order was issued.<sup>16</sup> Levitt (1996) provides evidence that states start responding to prison litigation before the court decision, specifically they start responding when the lawsuit is filed. The evidence in Figure 1 is consistent with this hypothesis, as corrections operating expenses per inmate increase slightly before the court order is imposed. Thus the difference in corrections expenditures per inmate before an after the court order may somewhat underestimate the effect of the court intervention.<sup>17</sup>

In this spirit, we utilize a difference-in-difference methodology to examine how states react to court intervention. In particular, we investigate the impact of court intervention on various outcomes described earlier by estimating reduced-form regressions depicted by Equation (1):

$$Y_{it} = \alpha_i + \beta_{it} + \theta_t + \delta_{rp} + \gamma X_{it} + \eta \text{CourtOrder}_{it} + \delta \text{CourtOrder}_{it} \times \text{Post}_{80} + \varepsilon_{it}, \quad (1)$$

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<sup>16</sup>Put differently, there is no indication of an “Ashenfelter dip.”

<sup>17</sup>Note that corrections operating expenditures *per capita* in litigated states (the dashed line in Figure 1) remain steady in comparison to non-litigated states until one year after the court order (period 1 on the horizontal axis), while corrections operating expenditures *per inmate* rise sharply in the year in which the court order is handed out (period zero on the horizontal axis). This picture is consistent with the empirical result we report below, which shows that prisoners per capita in the state declines in reaction to a court order. It seems to indicate that the immediate reaction of the state to a court order is to adjust the prison population, while a budget increase in corrections spending takes a year to implement, possibly because of the fiscal cycle of the state.

where the dependent variable  $Y_{it}$  stands for corrections expenditures (operating, or capital outlays) per prisoner, the death rate for prisoners, and prisoners per capita. Because the prison death rate contains zero values, we added one to this variable. These dependent variables are employed to investigate the impact of court orders on corrections expenditures and prison conditions. To analyze the extent to which states shift prisoners from state correctional facilities to local jails in reaction to federal court orders, we employ per capita jail expenditures and per capita state prisoners held in local jails because of prison crowding as additional dependent variables. Other dependent variables include per capita state general expenditures, per capita welfare expenditures, per capita expenditures on corrections, per capita expenditures on education, per capita transportation expenditures, and per capita expenditures on other items (such as administrative expenditures). These individual expenditure items comprise total state spending.

The vector  $X_{it}$  contains observable state characteristics as described in the data section above;  $\alpha_i$  stands for unobserved state characteristic and  $\theta_t$  represents year effects. The models also contain state-specific time trends, represented by  $\beta_{it}$ , and region-period effects, represented by  $\delta_{rp}$ . The regions consist of the nine census divisions, and the periods cover the four distinct periods described in Section 2 above: before 1970, between 1970 and 1980, between 1980 and 1995, and post 1995. Nineteen-seventy is the year of the first federal court order; 1980 is the year in which the justice department changed its policy towards prison litigation (Schlanger, 2006); and 1995 is the year in which Congress passed the Prison Litigation Reform Act. We also include an interaction term between the percentage of black population and the poverty rate.

“CourtOrder $_{it}$ ” is an indicator variable which takes the value of one if state  $i$  is under the court order in time  $t$ , and zero otherwise. “CourtOrder” can take the value of one only in litigated states, but there is variation in exposure to the “treatment”

by a court order between litigated states; that is, in some states the court order remained effective for longer periods than others. For example, we see in Table 1 that the duration of a court order was from 1975 to 1997 in Louisiana, but it was from 1970 to 1982 in Arkansas. We include an interaction term between CourtOrder and a dummy variable which is equal to one in and after 1980 ( $\text{Post}_{80}$ ) to account for the potentially different impact of court orders after 1980. We expect  $\text{Post}_{80} \times \text{CourtOrder}$  to decrease corrections expenditures since it has been argued that court orders had a smaller effect after the 1980s because of the narrowed scope of prison litigation in the 1980s (Fliter, 1996; Schlanger, 2006). Because the percentage of female headed households is available until 2000, Equation (1) is estimated for the years 1961-2000.

While the model depicted by Equation (1) analyzes the impact of a court order on the outcomes of interest, another interesting aspect is the extent to which a release from a court order influences the same outcomes. For example, while it is important to investigate whether the imposition of a court order increases prison spending and decreases spending on welfare programs, it is equally important to analyze if the effect of a release from court order is symmetric. More specifically, Equation (2) below is used to investigate the impact of a release, conditional on being under a court order:

$$Y_{it} = \kappa_i + \pi_{it} + \tau_t + \delta_{rp} + \lambda X_{it} + \mu \text{Release}_{it} + \omega_{it}, \quad (2)$$

where Release is a dichotomous variable which takes the value of one in the year during which the state was released from court order as well as in all years afterwards until the end of the sample. Thus, the variable Release captures the “treatment period” for the state, in which the “treatment” is the release from a court order. The data on the proportion of female-headed households is available until 2000, but New Hampshire and Texas were releases from court order in 2001 and 2002, respectively. To include these events to the analysis we ran the models without female-headed

household variable, which created a sample that spans from 1972 to 2006.

Equation (2) is estimated in the sample of litigated states and in the years following the initiation of a court order. More precisely, this sample includes all state-years after a state came under the court order.<sup>18</sup> For example, Table 1 shows that Alabama came under court order in 1975. Therefore, the sample includes the observations from Alabama in years 1975 and later. The same argument applies to the other states listed in Table 1. Thus, Equation (2) investigates whether the release from the court order had an impact on outcomes (conditional on being under the court order).

## 5 Results

Table 3–A displays the results obtained by estimating Equation (1). The variables are in logarithms. All models include state fixed-effects, time dummies, state-specific trends and region-period effects. Robust standard errors are clustered at the state level. The results reported in Column (1) indicate that, following the court intervention, corrections operating expenditures per prisoner increase by about 25%.<sup>19</sup> Column (2) displays the results obtained from the model where the dependent variable is correctional capital outlays per prisoner. The estimated coefficient of CourtOrder indicates that being under the court order generates an increase in per inmate correctional capital outlays by 150% following the court intervention. These estimates imply that corrections operating and capital expenditures go up by \$147 million for an average state. Court orders decrease the prison death rate by 20% as shown in column (3), which translates into about 6 fewer deaths per year for an average state. The result in column (4) indicates that court orders generate a 16% decline in prisoners per capita.

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<sup>18</sup>This specification does not include an interaction term with Post<sub>80</sub> because no state was released from a court order prior to 1980.

<sup>19</sup>The percentage impact is calculated as  $\exp\{\beta - \frac{1}{2} \times \text{Var}(\beta)\} - 1$ , see Kennedy (1981).

The coefficient of  $\text{CourtOrder} \times \text{Post}_{80}$  ( $\delta$ ) is of the opposite sign of  $\text{CourtOrder}$  ( $\eta$ ) in all regressions with the exception of jail expenditures. We cannot reject the hypothesis that the sum of  $\eta$  and  $\delta$  is zero in case of corrections capital expenditures and prison deaths. This result suggests that while court orders increased capital expenditures and reduced prison deaths prior to 1980, court orders had no significant impact on these outcomes after 1980. This finding is consistent with the hypothesis that post-1980, court orders had were narrowed in scope (Fliter, 1996; Schlanger, 2006). On the other hand, the sum of  $\eta$  and  $\delta$  is negative and significantly different from zero for inmates per capita ( $p=0.08$ ), indicating that court orders had a smaller but still statistically significant impact on prison crowding after 1980. The impact of the court orders on operating expenses (column 1) is the same in pre- and post-1980 periods, indicating that court orders increased corrections operating expenditures throughout the entire period of analysis.

A potential reaction of states to court orders could be for states to shift the prison population to local jails. Columns (5) and (6) of Table 3–A display the results where per capita jail expenditures and per capita state prisoners who are held in local jails due to overcrowding are used as dependent variables. In neither case we detect a statistically significant impact of the “CourtOrder,” indicating that jail populations do not change in reaction to court orders.

Given that court orders decrease prison population and improve prison conditions, as revealed by a decline in prison deaths and prison population, court orders effectively reduce deterrence.<sup>20</sup> As described in the introduction, welfare spending may be a tool for short-term crime prevention as a substitute for other deterrence measures such as imprisonment and prison conditions. Spending on education is another potential but

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<sup>20</sup>In fact, Levitt (1996) has shown that the decrease in prison population due to court orders had a significant impact on state crime rates.



longer-term vehicle through which crime commission can be influenced. Therefore, we examine whether the increase in the cost of punishing criminals was associated with an increase in welfare spending or education spending. More generally, we investigate whether states re-allocate resources following the court orders.

Table 3–B displays the result of the models where per capita state expenditures (in column 1) and various spending categories of the state (columns 2–6) are the dependent variables. These spending categories exhaust total state expenditures.<sup>21</sup>

Column (1) of Table 3–B indicates that court orders have no impact on per capita general state spending. Consistent with the results reported in Table 3–A, column (2) shows that court orders increase per capita correctional spending by 14 %. In column (3) the coefficient of CourtOrder is negative and statistically significant, indicating the unintended consequence of reducing welfare spending: court orders generate about a 8% reduction in per capita welfare spending. Columns (4) through (6) demonstrate that court orders have no impact on transportation spending, education spending, or other state spending.

Taken together, the results displayed in Tables 3–A and 3–B demonstrate that court orders improved prison conditions, and they increased the cost of providing correctional services. In reaction, states decreased the resources allocated to welfare spending. During our period of study (1961 through 2000), there were numerous changes in the federal rules that determine welfare. Thus, we may be concerned that our results are driven by correlation between prison litigation and changes in federal welfare rules. This scenario is unlikely since we provide evidence that in response to court intervention, states did not increase total expenditures and they did not decrease expenditures in any other category other than welfare. Nonetheless,

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<sup>21</sup>Average per capita state general expenditures is \$2,760. Average per capita state spending on education is \$1,023. It is \$722 for welfare, \$395 for transportation, \$134 for correctional spending and \$558 for other items, such as administration.

to investigate if the impact of court orders on state welfare spending is sensitive to model specification, we estimate a variety of models for welfare spending and report the results in Table 3–C. For example, the specification in the first column of Table 3–C is the same specification reported in column (3) of Table 3–B, but we drop the interaction term of the CourtOrder and the Post-1980 dummy. The model in column (2) is the same as in column (1), but we exclude the region-period interactions. The point estimates in Table 3–C vary from -0.06 to -0.09, but in each specification the impact of CourtOrder on welfare spending is negative and statistically significant, demonstrating that court orders prompted the states to reduce their spending on welfare.

As a further check of the validity of the identification strategy, we investigate the impact of exposure to court orders on the different facets of the criminal justice system; police spending and jail spending. Specifically, we examine the impact of court orders on the *difference* between state correctional operating expenditures per prison inmate and (i) police expenditures per arrest, and (ii) jail expenditures per jail inmate. If corrections expenditures and other criminal justice expenditures *move in tandem* in states that are exposed to court orders *as well as* in states that are not under the court order, this would imply that some unobserved factors confound the impact of court orders on corrections spending. Put differently, if federal intervention has an effect, the difference between corrections expenditures and other criminal justice expenditures are expected to get larger in states that are exposed to court orders. Thus, the difference-in-difference-in-differences estimates allow us to control for unobserved factors that are not accounted for by state fixed effects, year fixed effects, state specific time trends and region-period effects.

Table 4 displays the results of the model where the dependent variable is the difference between per inmate corrections spending and other correctional expenditures (in

logs, normalized by inmates, arrests, or population). The coefficient of CourtOrder is positive and statistically significant, indicating that the wedge between corrections operating expenditures and other correctional expenditures increased in states that were exposed to court orders in comparison to those states that were not.

To investigate the impact of having been released from a court order, we estimated models depicted by Equation (2). Tables 5–A and 5–B display the results. The sample sizes are smaller in these specifications because they analyze the impact of having been released from the court order, given that a court order was imposed. Because we have only 12 states that contribute to this identification, clustered robust standard errors underestimate standard errors. Thus, we follow Cameron, Gelbach and Miller (2008) and provide bootstrapped p-values for the variable Release [in brackets]. Regardless of whether we compute p-value using limiting p-values or bootstrap, welfare spending does not increase when states are released from court order. Thus, the budget cuts that are associated with welfare programs following the court order are not restored after the state’s release from court order. Similarly, states do not alter per inmate corrections spending when the court order is lifted, and prison deaths per inmate and inmates per capita do not change when states are released from the court order.

To investigate the robustness of the results, we analyzed whether the results were sensitive to the omission of Alaska and Hawaii. Alaska receives its tax revenues from oil, which is a highly variable revenue source. Hawaii is also unusual as a large percentage of its revenues comes from tourism. However, omitting these states did not alter the results. We estimated the prison death equation using the level of (deaths per 1,000 inmates) as the dependent variable, rather than its logarithm. About four percent of the sample contained zeros for this variable. Estimating the prison death rate regression in levels did not alter the results. The coefficient of CourtOrder was estimated as  $-0.83$  ( $p=0.028$ ), indicating a reduction of about 8 deaths for an average

state, which is similar to the results obtained from the model with logarithms.

## 6 Conclusion

Although it is believed that the intervention of federal courts has improved the conditions in state prisons, very little systematic analysis is available on the impact of court orders. The extent to which the federal court order are enforceable is disputed (Fliter, 1996; Taggart, 1989; Harriman and Straussman 1983). Even if the court orders are fully enforceable, the response of states having to spend additional resources on prisons depends on numerous factors such as the level of heterogeneity in the population, the shape of the utility function of the median voter (Baicker, 2001), the deadweight cost of taxes and subsidies (Becker and Mulligan, 2001), and the cost of altering the provision of various government services. Therefore, theoretically, the impact of federal court orders on prison spending and prison conditions is ambiguous. Furthermore, there exists no research that investigates the reaction of states to federal court orders in such dimensions as education spending and welfare expenditures.

In this paper we employ a state-level panel data set to investigate states' reactions to federal court interventions. Specifically, we analyze the impact of court orders on prison spending, prison conditions, per capita prisoners, as well as state spending on welfare, education, transportation, and other state spending. We find that court intervention in state prisons increased per inmate operating expenditures by about 25%, increased per capita corrections capital expenditures by 150%, decreased prisoners per capita by 16 percent and prison mortality by 6 prisoner deaths per year for an average state.

We also investigate the effect of the release from a court order, and we find no evidence that when the court orders are lifted states adjust back their corrections expenditures. Similarly, prison mortality rate does not change following the release

of the court order.

Because court orders make it more expensive for states to deter crime through imprisonment, one could expect states to shift towards relatively cheaper means of deterring crime. For example, given that spending on education and welfare programs are expected to negatively impact criminal activity, states could spend more on these budget items following the imposition of court orders. However, we find that following court orders, state expenditures on education, transportation, and other items remained the same, but expenditures on welfare decreased by about 8%. In addition, our results indicate that after the state has been released from court order, welfare spending is not restored. The results follow from a difference-in-differences methodology. Thus, they denote changes that arise because of the exposure to a court order relative to a group of comparison states. For instance, welfare expenditures may have increased in all states, but the increase was smaller in states that were subject to court order.

One explanation of these finding is that increases in expenditures in those programs that affect the poor trigger a decrease in expenditures in other programs that also affect the poor. For instance, if state legislators believe that welfare recipients and criminals come from the same social groups, then cutting welfare spending may be considered a substitute to imprisonment in punishing criminals by the legislators. Another explanation is that spending on expenditure categories is “sticky.” Hysteresis in welfare spending can emerge because the average duration of a court order is 18 years, and the governors and state legislators change during this period. Thus, it is conceivable state legislators who are in office when the state is released from the court order are not concerned with a budget re-allocation that took place years ago, long before they were elected to office. Regardless of the mechanism that generates this outcome, the findings underscore that states shift the burden of increased correctional

spending on the poor.

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Table 1: States Subject to Federal Court Intervention – “Litigated States”

State	Case	Citation	Year of Court Decision	Year of Release
AL	Pugh v. Locke	Injunction (M.D. Ala.)	1975	1989
AR	Holt v. Server	300 F. Supp. 825 (E.D. Ark)	1970	1982
FL	Costello v. Wainwright	489 F.Supp. 1100 (M.D. Fl.)	1980	1993
LA	Williams v. Edwards	Injunction (M.D. La.)	1975	1997
MS	Gates v. Collier	349 F. Supp. 881 (N.D. Miss.)	1972	1998
NM	Duran v. Apodaca	Consent decree (D. N.M.)	1980	1998
NH	Laaman v. Helgemoe	437 F.Supp. 269 (D.N.H.)	1977	2001
OK	Battle v. Anderson	376 F. Supp. 402 (E.D. Ok.)	1974	1986
RI	Palmigiano v. Garrahy	443 F. Supp. 956 (D. R.I.)	1977	1995
SC	Nelson v. Leeke	Consent decree (D. S.C.)	1985	1996
TN	Grubbs v. Bradley	552 F. Supp. 1052 (M.D. Tenn.)	1982	1996
TX	Ruiz v. Estelle	503 F. Supp. 1265 (S.D. Tex.)	1980	2002

Table 2: Summary Statistics (years 1961–2000)

Variable	N	Mean	Std. Dev.	Min	Max
Corr. Oper. Exp./Inm.	1889	\$34,302	\$16,401	\$3,910	\$122,671
Corr. Capit. Exp./Inm.	1889	\$4,512	\$5,903	\$0	\$77,285
Death per Inmate ( $\times 1000$ )	1842	2.89	1.89	0.00	25.06
Inmates per Cap. ( $\times 1000$ )	1889	1.78	1.33	0.20	8.91
Jail Exp. Per Cap.	1316	\$28.67	\$25.86	\$0.00	\$153.01
Jail Overcrowd./Cap. ( $\times 1000$ )	1736	0.11	0.33	0.00	3.88
State General Exp./Cap.	1940	\$2,763	\$1,185	\$625	\$12,243
State Welfare Exp./Cap.	1940	\$722	\$400	\$136	\$2,516
State Corrections Exp./Cap.	1940	\$66	\$ 51	\$6	\$351
State Transp. Exp./Cap.	1940	\$394	\$172	\$139	\$1,669
State Education Exp./Cap.	1940	\$1,023	\$ 394	\$149	\$3,064
State Other Exp./Cap.	1940	\$558	\$447	\$56	\$5,443
Court Order	1940	0.12	0.32	0.00	1.00
Poverty Rate	1940	14.39	5.38	4.34	50.91
Female Head. HH.	1940	2.17	0.96	0.61	6.84
Ideology	1940	45.87	16.34	0.96	93.91
Income per Capita	1940	\$24,776	\$6,320	\$9,098	\$ 49,959
Unemployment Rate	1940	2.91	1.45	0.50	9.70
% Black	1940	9.50	9.39	0.14	41.50
% Urban	1940	67.76	14.96	25.68	100.00
% Population 0-14	1940	24.93	3.99	17.94	37.42
% Population 15-24	1940	16.40	2.16	9.64	21.39
% Population 25-44	1940	27.72	3.65	16.26	38.37
% Population 45-54	1940	10.93	1.90	7.40	40.62
% Population 55+	1940	20.03	2.68	9.71	28.78

Table 3-A: Impact of Federal Court Orders on Corrections

	(1)	(2)	(3)	(4)	(5)	(6)
	Corrections Oper. Exp. per Inm.	Corrections Capital Exp. per Inm.	Deaths per Inm.	Inmates per Cap.	Jail Exp./Cap.	Jail Overcrowd. per Cap.
Court Order	0.226*** (0.0549)	0.939*** (0.219)	-0.217* (0.116)	-0.174*** (0.0487)	0.0284 (0.104)	-0.186 (0.521)
Court Order $\times$ Post <sub>80</sub>	-0.0924 (0.0599)	-0.861*** (0.297)	0.198 (0.159)	0.112** (0.0537)	0.0203 (0.115)	0.109 (0.539)
Poverty Rate	0.0535 (0.206)	-0.393 (0.685)	-0.0276 (0.306)	-0.345* (0.173)	0.537 (0.388)	0.828 (2.292)
Fem. Head. HH.	0.0614 (0.201)	-1.754* (0.993)	-1.034*** (0.327)	-0.339 (0.218)	0.0129 (0.410)	1.321 (2.794)
Pov. Rate $\times$ % Black	-0.0152 (0.0343)	-0.0180 (0.130)	0.0599 (0.0504)	-0.0863*** (0.0309)	0.0987 (0.105)	-0.003 (0.480)
Ideology	0.0355 (0.0468)	-0.337** (0.142)	-0.0225 (0.0918)	0.0494 (0.0344)	-0.0820 (0.0683)	0.599 (0.387)
Income/Capita	0.754** (0.369)	3.257** (1.219)	-0.885 (0.686)	-0.490* (0.286)	1.161 (0.770)	0.962 (3.226)
Unemp. Rate	0.0870* (0.0502)	0.179 (0.191)	-0.0630 (0.0741)	0.0457 (0.0443)	0.137 (0.0831)	-0.353 (0.330)
% Black	0.0843 (0.154)	-0.563 (0.940)	-0.452 (0.393)	-0.0838 (0.174)	0.0140 (0.356)	0.760 (2.197)
% Urban	-0.293 (0.277)	0.946 (1.633)	-0.341 (0.512)	0.678* (0.363)	0.252 (1.178)	9.253 (6.898)
% Population 15-24	0.409 (0.314)	0.650 (1.661)	0.964 (0.592)	0.242 (0.223)	0.290 (0.949)	2.157 (3.220)
% Population 25-44	0.548 (0.822)	-5.758 (3.617)	2.330** (1.080)	0.204 (0.912)	3.111** (1.294)	-3.299 (8.251)
% Population 45-54	-0.0633 (0.335)	-1.366 (1.425)	0.761 (0.607)	0.508 (0.348)	0.924 (0.661)	0.484 (5.392)
% Population 55+	-0.550 (0.530)	-2.299 (2.443)	0.466 (0.699)	0.496 (0.429)	0.838 (1.675)	2.359 (7.215)
Observations	1889	1885	1842	1889	1239	1436
R-squared	0.933	0.372	0.335	0.971	0.948	0.775

NOTES – The dependent variables are the corrections operating expenditures per inmate, corrections operating expenditures per 1,000 residents, corrections capital expenditures per capita, prison deaths per 1,000 inmates and prisoners per 1,000 residents. All variables are in logarithms.

All models contain state fixed effects, year dummies and state trends as well as region-period effects. Regions correspond to nine census regions. Periods are pre-1970, 1970-1979, 1980-1995 and post-1995. \*\*\*, \*\* and \* indicate significance at 1%, 5% and 10%, respectively.

Table 3-B: Impact of Federal Court orders on the State Spending

	(1)	(2)	(3)	(4)	(5)	(6)
	General Exp./Cap.	Corrections Exp./Cap	Welfare Exp./Cap	Trans. Exp./Cap.	Educ. Exp./Cap.	Other Exp./Cap.
Court Order	-0.0347 (0.0218)	0.133** (0.0547)	-0.0792* (0.0423)	0.00591 (0.0615)	-0.0289 (0.0232)	-0.0372 (0.0358)
Court Order $\times$ Post <sub>80</sub>	0.0239 (0.0305)	-0.0721 (0.0674)	0.0333 (0.0446)	-0.0634 (0.0660)	0.0352 (0.0307)	0.0513 (0.0496)
Poverty Rate	-0.104* (0.0605)	-0.0658 (0.220)	-0.0682 (0.112)	-0.276** (0.117)	-0.166* (0.0871)	0.115 (0.0895)
Fem. Head. HH.	0.258** (0.123)	-0.554*** (0.191)	0.674*** (0.200)	-0.0838 (0.206)	0.146 (0.162)	0.253 (0.173)
Pov. Rate $\times$ % Black	-0.0384** (0.0178)	-0.0586 (0.0468)	-0.0440 (0.0288)	-0.0657*** (0.0237)	0.000281 (0.0219)	-0.0108 (0.0277)
Ideology	0.00369 (0.0119)	0.0211 (0.0358)	0.0120 (0.0193)	-0.00283 (0.0187)	0.0201 (0.0155)	-0.00744 (0.0174)
Income/Capita	0.291** (0.139)	0.620* (0.314)	0.175 (0.246)	0.747** (0.298)	0.144 (0.191)	0.320 (0.259)
Unemp. Rate	0.0683*** (0.0155)	0.142*** (0.0447)	0.0726*** (0.0238)	0.114*** (0.0317)	0.0573* (0.0290)	0.0539* (0.0271)
% Black	0.100 (0.0936)	-0.306 (0.236)	0.398** (0.169)	0.0996 (0.132)	-0.190 (0.137)	-0.0953 (0.163)
% Urban	0.000875 (0.343)	0.346 (0.662)	-0.337 (0.259)	0.420 (0.469)	0.0137 (0.353)	0.112 (0.547)
% Population 15-24	0.224 (0.159)	0.792** (0.336)	0.234 (0.211)	0.446 (0.282)	0.0490 (0.227)	0.0792 (0.217)
% Population 25-44	-0.379 (0.404)	0.616 (0.893)	-0.648 (0.751)	1.163* (0.585)	-1.431** (0.580)	-0.292 (0.549)
% Population 45-54	-0.545*** (0.135)	0.543* (0.300)	-0.434 (0.277)	-0.362* (0.202)	-0.678*** (0.191)	-0.862*** (0.249)
% Population 55+	-0.0664 (0.233)	-0.318 (0.493)	-0.285 (0.382)	0.181 (0.344)	-0.262 (0.312)	-0.660 (0.441)
Observations	1940	1940	1940	1940	1940	1940
R-squared	0.978	0.957	0.973	0.869	0.963	0.970

NOTES – The dependent variables are the total and state financed welfare expenditures per 1,000 residents, education expenditures per 1,000 residents, state and local police expenditures per 1,000 residents, and local correctional expenditures per 1,000 residents. All variables are in logarithms.

All models contain state fixed effects, year dummies and state trends as well as region-period effects. Regions correspond to nine census regions. Periods are pre-1970, 1970-1979, 1980-1995 and post-1995. \*\*\*, \*\* and \* indicate significance at 1%, 5% and 10%, respectively.

Table 3-C: Impact of Federal Court Orders on per Capita Welfare Spending

	(1)	(2)	(3)	(4)	(5)	(6)
Court Order	-0.0557** (0.0279)	-0.0597** (0.0279)	-0.0861* (0.0468)	-0.0669** (0.0285)	-0.0614** (0.0251)	-0.0862*** (0.0307)
Court Order $\times$ Post <sub>80</sub>			0.0346 (0.0510)			
Poverty Rate	-0.0657 (0.112)	-0.0656 (0.117)			0.0195 (0.0903)	
Fem. Head. HH.	0.686*** (0.201)	0.695*** (0.203)			0.813*** (0.194)	
Pov. Rate $\times$ % Black	-0.0415 (0.0292)	-0.0410 (0.0286)			-0.00398 (0.0208)	
Ideology	0.0120 (0.0195)	0.00975 (0.0187)			0.0144 (0.0200)	
Income/Capita	0.176 (0.246)	0.136 (0.244)	-0.263 (0.217)	-0.306 (0.218)		
Unemp. Rate	0.0744*** (0.0235)	0.0767*** (0.0247)	0.0727*** (0.0245)	0.0759*** (0.0252)		
% Black	0.390** (0.170)	0.393** (0.171)	0.315* (0.173)	0.321* (0.174)		
% Urban	-0.338 (0.261)	-0.335 (0.263)	-0.477* (0.249)	-0.489* (0.254)		
% Population 15-24	0.243 (0.209)	0.256 (0.205)	0.268 (0.226)	0.305 (0.224)	0.169 (0.214)	
% Population 25-44	-0.641 (0.750)	-0.665 (0.754)	-0.720 (0.729)	-0.720 (0.734)	-0.881 (0.731)	
% Population 45-54	-0.431 (0.275)	-0.440 (0.283)	-0.260 (0.294)	-0.258 (0.300)	-0.468* (0.269)	
% Population 55+	-0.282 (0.380)	-0.272 (0.375)	-0.215 (0.387)	-0.205 (0.378)	-0.431 (0.346)	
Observations	1940	1940	1940	1940	1940	1940
R-squared	0.973	0.972	0.971	0.970	0.971	0.967
State Fixed Effects	Yes	Yes	Yes	Yes	Yes	Yes
Year Dummies	Yes	Yes	Yes	Yes	Yes	Yes
State Trends	Yes	Yes	Yes	Yes	Yes	Yes
Region-period Dummies	Yes	No	Yes	No	Yes	Yes

NOTES – The dependent variables are the corrections operating expenditures per inmate, corrections operating expenditures per 1,000 residents, corrections capital expenditures per capita, prison deaths per 1,000 inmates and prisoners per 1,000 residents. All variables are in logarithms.

All models contain state fixed effects, year dummies and state trends as well as region-period effects. Regions correspond to nine census regions. Periods are pre-1970, 1970-1979, 1980-1995 and post-1995. \*\*\*, \*\* and \* indicate significance at 1%, 5% and 10%, respectively.

Table 4: Impact of Federal Court Orders on the Difference Between Corrections Operating Expenditures and Spending on Police and Jails

	(1)	(2)
	Corr. Oper-Police	Correct Oper. -Jails
Court Order	0.416*** (0.155)	0.262*** (0.072)
Court Order $\times$ Post <sub>80</sub>	-0.271** (0.133)	-0.224** (0.100)
Poverty Rate	0.390 (0.399)	-0.277 (0.296)
Fem. Head. HH.	-0.421 (0.279)	-0.523** (0.206)
Pov. Rate $\times$ % Black	0.143 (0.102)	-0.144 (0.100)
Ideology	-0.027 (0.101)	0.295** (0.143)
Income/Capita	-1.119 (1.216)	-0.342 (0.471)
Unem. Rate	-0.078 (0.088)	-0.158** (0.068)
% Black	-0.362 (0.766)	0.571 (0.399)
% Urban	-1.955* (1.035)	-0.632 (0.820)
% Population 15-24	0.590 (0.538)	0.257 (0.506)
% Population 25-44	2.769 (2.316)	-2.833*** (0.975)
% Population 45-54	1.206 (1.264)	-0.568 (0.588)
% Population 55+	0.387 (1.130)	-0.200 (1.073)
Observations	1110	1205
R-Squared	0.63	0.76

NOTES – Corrections Operating Expenditures, Police Expenditures and Jail Expenditures are normalized by the number of inmates in prison, number of arrests and the number of inmates in jail, respectively. All variables are in logarithms. All models contain state fixed effects, year dummies and state trends as well as region-period effects. Regions correspond to nine census regions. Periods are pre-1970, 1970-1979, 1980-1995 and post-1995. \*\*\*, \*\* and \* indicate significance at 1%, 5% and 10%, respectively.



Table 5-A: Impact of Releases from Federal Court Orders on Corrections

	(1)	(2)	(3)	(4)	(5)	(6)
	Corrections Oper. Exp. per Inm.	Corrections Capital Exp. per Inm.	Deaths per Inm.	Inmates per Cap.	Jail Exp./Cap.	Jail Overcrowd. per Cap.
Release	-0.137 (0.0462) [0.716]	-0.285 (0.275) [0.794]	0.166 (0.0984) [0.857]	0.0510 (0.0390) [0.918]	0.0191 (0.0851) [0.986]	-0.101 (0.582) [0.960]
Poverty Rate	-0.368 (0.305)	-2.005 (3.449)	-0.655 (1.250)	0.242 (0.308)	-0.776 (0.715)	1.569 (5.539)
Pov. Rate $\times$ % Black	-0.116 (0.100)	-0.256 (0.768)	-0.00995 (0.469)	0.0960 (0.0702)	-0.0671 (0.182)	-0.268 (1.141)
Ideology	0.0452 (0.102)	-0.564 (0.503)	-0.173 (0.206)	-0.0191 (0.0679)	-0.135 (0.191)	-0.313 (0.619)
Income/Capita	1.179 (0.914)	0.901 (3.897)	0.241 (1.293)	-0.0678 (0.654)	1.699 (0.986)	-5.024 (6.051)
Unemp. Rate	0.141 (0.0340)	0.145 (0.431)	0.345 (0.154)	0.0133 (0.0369)	0.356 (0.105)	-0.903 (0.659)
% Black	0.785 (0.335)	1.861 (2.340)	1.464 (1.161)	-0.568 (0.223)	1.300 (0.785)	-2.867 (4.877)
% Urban	-1.325 (1.209)	1.915 (4.468)	4.130 (2.729)	1.240 (0.693)	3.551 (1.921)	-13.612 (11.780)
% Population 15-24	-1.296 (0.506)	0.489 (3.604)	2.676 (1.439)	-0.0918 (0.401)	-2.685 (1.653)	10.18 (8.034)
% Population 25-44	-1.571 (1.544)	-5.589 (9.162)	4.259 (2.966)	0.717 (0.827)	2.631 (2.961)	14.29 (23.76)
% Population 45-54	0.440 (1.285)	0.539 (6.981)	0.111 (1.419)	-0.280 (0.920)	1.495 (2.495)	9.688 (9.733)
% Population 55+	1.247 (1.706)	-3.755 (6.704)	0.140 (2.035)	-0.685 (1.427)	-0.452 (2.826)	0.201 (18.18)
Observations	355	355	355	355	290	347
R-squared	0.945	0.592	0.434	0.984	0.935	0.873

NOTES – The dependent variables are the corrections operating expenditures per inmate, corrections operating expenditures per 1,000 residents, corrections capital expenditures per capita, prison deaths per 1,000 inmates and prisoners per 1,000 residents. All variables are in logarithms.

All models contain state fixed effects, year dummies and state trends as well as region-period effects. Regions correspond to nine census regions. Periods are pre-1970, 1970-1979, 1980-1995 and post-1995. The values in [brackets] are the p-values of the estimated coefficients of Release based on bootstrapping proposed by Cameron, Gelbach and Miller (2008). \*\*\*, \*\* and \* indicate significance at 1%, 5% and 10%, respectively.

Table 5-B: Impact of Releases from Federal Court Orders on State Spending

	(1)	(2)	(3)	(4)	(5)	(6)
	General Exp./Cap.	Corrections Exp./Cap	Welfare Exp./Cap	Trans. Exp./Cap.	Educ. Exp./Cap.	Other Exp./Cap.
Release	-0.0317 (0.0178) [0.802]	-0.0817 (0.0685) [0.789]	0.00584 (0.0383) [0.990]	-0.0209 (0.0540) [0.938]	-0.0598 (0.0136) [0.324]	-0.0540 (0.0380) [0.780]
Poverty Rate	-0.125 (0.147)	-0.0565 (0.449)	-0.219 (0.375)	-0.165 (0.573)	-0.0651 (0.104)	0.140 (0.280)
Pov. Rate $\times$ % Black	-0.0841 (0.0540)	0.0423 (0.108)	-0.112 (0.105)	-0.109 (0.122)	-0.0346 (0.0265)	-0.0512 (0.101)
Ideology	0.0215 (0.0361)	-0.0393 (0.0996)	0.0698 (0.0603)	-0.0452 (0.0789)	0.0228 (0.0213)	-0.0229 (0.0640)
Income/Capita	0.987 (0.202)	1.167 (0.637)	0.858 (0.400)	1.484 (0.434)	0.960 (0.260)	1.359 (0.450)
Unemp. Rate	0.0339 (0.0261)	0.194 (0.0602)	-0.0268 (0.0601)	0.0681 (0.0873)	0.0588 (0.0173)	0.123 (0.0525)
% Black	0.165 (0.200)	0.202 (0.414)	0.235 (0.272)	0.0338 (0.256)	0.166 (0.145)	-0.00890 (0.436)
% Urban	-0.670 (0.398)	0.810 (0.995)	0.239 (0.574)	-2.264 (0.946)	-2.134 (0.344)	0.662 (0.855)
% Population 15-24	-0.717 (0.366)	-0.682 (0.640)	-0.569 (0.725)	-1.029* (0.498)	-1.061 (0.279)	-0.211 (0.484)
% Population 25-44	-0.858 (0.499)	-1.160 (1.486)	-1.504 (1.195)	-0.395 (1.793)	-1.350* (0.643)	0.457 (1.087)
% Population 45-54	-0.755 (0.371)	-0.165 (1.122)	-0.427 (0.622)	-1.968 (0.856)	-0.243 (0.331)	-1.251 (0.714)
% Population 55+	0.613 (0.270)	0.0160 (1.024)	-2.057 (0.838)	3.218 (1.619)	2.651 (0.396)	1.563 (0.955)
Observations	357	357	357	357	357	357
R-squared	0.983	0.956	0.971	0.800	0.984	0.967

NOTES – The dependent variables are the total and state financed welfare expenditures per 1,000 residents, education expenditures per 1,000 residents, state and local police expenditures per 1,000 residents, and local correctional expenditures per 1,000 residents. All variables are in logarithms.

All models contain state fixed effects, year dummies and state trends as well as region-period effects. Regions correspond to nine census regions. Periods are pre-1970, 1970-1979, 1980-1995 and post-1995. The values in [brackets] are the p-values of the estimated coefficients of Release based on bootstrapping proposed by Cameron, Gelbach and Miller (2008). \*\*\*, \*\* and \* indicate significance at 1%, 5% and 10%, respectively.