Reducing Recidivism through Correctional Education:

The Roles of Neoclassical and Behavioral Economics

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he correctional system in the United States is expensive and often punitive rather than rehabilitative. One potential way to reduce both recidivism rates and criminal justice spending is through correctional education. This paper explores the value of correctional education through both neoclassical and behavioral economic perspectives and considers potential tradeoffs and implementation challenges to expanding correctional education. Policymakers and the public at large may hesitate to provide such a service, but it is important to consider cost-effective ways to reduce recidivism. Ultimately, evidence suggests that correctional education is an effective way to reduce recidivism rates and potentially save money.

INTRODUCTION

The United States currently has the highest incarceration rate in the world, with the prison population standing at approximately 2.2 million people. Much of this population includes individuals who reoffend. In fact, "over 600,000 prisoners are released each year and over 70 percent of those are re-arrested within five years of release" (Executive Office of the President 2016). Because of the large imprisoned population, the U.S. government spends significant amounts of money on incarceration. According to the Bureau of Justice Statistics, over \$84 billion was spent on corrections between federal, state, and local entities in 2012 alone (Kyckelhahn 2013). Therefore, it is important to identify policies that can reduce crime and incarceration.

One promising approach is to reduce recidivism rates through correctional education. Correctional education includes a variety of educational programs provided to incarcerated individuals. It can include adult basic education, which provides basic educational skills; adult secondary education, which typically provides a high school equivalency, like the General Education Development (GED); vocational training, which provides general employment skills or industry-specific skills; and postsecondary education, which provides college-level courses (Davis et al. 2013). However, the public may hold a negative view of this service because of an expectation that prison should be strictly punitive. Correctional education is sometimes viewed as a free service for inmates for which the general public is ineligible, instead of a tool to reduce crime and recidivism rates (Petersilia 2003, 3, 4, 17). This paper will first use a neoclassical economic lens to identify how correctional education can reduce recidivism rates and produce net savings to society. Second, it will consider how the lessons of behavioral economics can further increase the overall gains from correctional education. Third, the paper will weigh the tradeoffs and implementation challenges of such policies.

NEOCLASSICAL ECONOMIC PERSPECTIVE: THE EFFECT OF CORRECTIONAL EDUCATION ON RECIDIVISM

Economically speaking, an efficient criminal justice system should "maximize the safety of citizens and minimize criminal activity while also limiting the direct and indirect costs of criminal justice policies to individuals, communities and the economy" (Executive Office of the President 2016, 34). The government attempts to deter crime and ensure safety through monetary sanctions, probation, and incarceration, while also attempting to do so with economic efficiency (38). However, the high incarceration rate and its costs cast doubt on the efficiency of the U.S. criminal justice system. The total costs of crime include its direct monetary losses to victims, the pain and fear of victims, and indirect costs such as decreased property values and reduced economic opportunity. It also includes the amount spent on the costs of incarceration, which can include education, physical and psychological health, clothing, food, jail and prison facilities, correctional staff, etc. Because the direct and indirect costs of crime are high, it is important to ensure that the criminal justice system reduces crime in a cost-effective way.

Traditionally, economists view the existence of crime as evidence that crime pays for perpetrators. In turn, the government aims to reduce these benefits and increase costs to

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reduce crime's appeal. Specifically, arrest and incarceration are intended to raise cost, but as sentences lengthen and the imprisoned population grows, incarceration appears to have a diminishing marginal effect on criminal behavior. In other words, "when incarceration rates are high, further incarceration entails incapacitating offenders who are on average lower risk, which means that their incarceration will yield fewer public safety benefits" (Executive Office of the President 2016). Because of these declining benefits, it is useful to consider alternative methods to reduce incarceration rates without compromising public safety. One way to accomplish this is by reducing recidivism rates, specifically through correctional education.

Studies repeatedly demonstrate that correctional education in prisons can reduce recidivism rates. It does so primarily by increasing post-release employment (Davis et al. 2013). Those who participate in correctional education are employed at higher rates post-release than their peers who do not participate (Brazzell et al. 2009, 18 - 19). These higher rates of employment increase the opportunity cost of crime, meaning that those who are employed may be less likely to commit additional crimes, bolstering the value and purpose of correctional education.

The benefits of correctional education exist across multiple types of training and education. Various studies suggest that vocational training, adult basic education, adult secondary education, and adult postsecondary education are all correlated with lower recidivism rates and higher employment levels and wages (Brazzell et al. 2009). However, the literature suggests that post-release employment is most associated with participation in either vocational education or a mix of vocational and academic education (Schumaker, Anderson, and Anderson 1990; Gordon and Weldon 2003, 206-207). In other words, the combination of these types of education and training raised the opportunity cost of crime the most because these programs led to the greatest increase in human capital. However, the data regarding which type of correctional education is most effective are still mixed (Davis et al. 2013).

Correctional education is not available to all those who are incarcerated primarily because it is costly. Lawmakers and politicians often argue against correctional education because it is viewed as providing free education to inmates at the expense of non-offenders, rather than as a tool to reduce recidivism and total spending on the criminal justice system (Petersilia 2003, 17 - 18). According to the "principle of least eligibility," prisoners should not be treated in a way that is superior to the lowest free members of society (Sieh 1989). Consequently, spending on correctional education has decreased. Ironically, spending on prison sentences and prisons themselves has increased while spending on rehabilitative programs like correctional education has decreased (Hall 2015).

When crime decreases and employment increases, there is a "reduction of costs associated with incarcerating offenders, a reduction of strain on the offenders and their families, and an economic boost for society" (Hall 2015). When the criminal justice system reduces crime through rehabilitation instead of simply punishing offenders, society at large benefits.

Evidence from Washington state provides estimates of the savings associated with correctional education. The Washington state legislature directed the Washington State Institute for Public Policy (WSIPP) to project "evidence-based options" to reduce crime rates and save taxpayer money. They determined that a \$962 per prisoner investment in correctional

education would lead to savings of \$5,306 per prisoner in criminal justice costs, based on a 7 to 9 percent reduction in recidivism. Additionally, investing \$1,182 per prisoner in vocational training would save \$6,806 in future criminal justice costs. These findings looked simply at programing costs versus incarceration costs; thus, these significant savings do not include the additional social and economic benefits of reducing crime and increasing employment, further reinforcing the value of the investment (Aos, Miller, and Drake 2006).¹

A Bureau of Justice Statistics-sponsored RAND meta-analysis provides additional evidence of the savings from correctional education. This study examined a series of reports released between 1980 and 2011 and confirmed that spending money on correctional education led to savings later because fewer people were re-incarcerated. The RAND Corporation meta-analysis also found that, on average, "inmates who participated in correctional education programs had 43 percent lower odds of recidivating than inmates who did not," and "the odds of obtaining employment post-release among inmates who participated in correctional education... was 13 percent higher than the odds for those who did not [participate]" (Davis et al. 2013).

Many variables affect the success of individual programs, but there is significant economic evidence that the benefits of correctional education outweigh the costs.

BEHAVIORAL ECONOMIC PERSPECTIVE: THE EFFECT OF CORRECTIONAL EDUCATION ON RECIDIVISM

Behavioral economics constitutes an important addition to the classic, rational economic model. The rational economic model ignores demonstrated anomalies in human behavior. Humans in fact do not behave as entirely rational actors. Several behavioral economic concepts demonstrate human irrationality. For example, people display a "status quo bias," meaning they prefer the current state over uncertain but seemingly superior future states. Humans are also loss averse, so the disadvantages of leaving the status quo often seem larger than the advantages (Kahneman, Knetsch, and Thaler 1991). In other words, humans are present-biased.

Present bias can be observed in the criminal justice system. The United States spends relatively little on correctional education despite evidence that it is a cost-effective way to reduce recidivism rates. Because lawmakers may harbor a present bias, they might be less likely to invest in correctional education since the savings will not be observable until much later (Viscusi and Gayer 2015). To increase funding for correctional education, lawmakers must be convinced of its value in the present.

Individual offenders must also see the value in correctional education to generate

¹ A WSIPP meta-analysis by the same authors reviewed the findings of 545 comparison-group evaluations of various corrections and prevention programs. After the extensive meta-analysis process, they conducted a cost-benefit analysis by monetizing the benefits to taxpayers and potential future crime victims. They estimated the cost of the program versus the cost of not participating in said program, and then compared costs and benefits. The analysis considered relative effect sizes of the programs reviewed. The results of the research showed savings based on investments in correctional education (Drake, Aos, and Miller 2009, 190, 192).

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substantial cost savings. For example, prisoners may not enroll in or complete postsecondary programs due to insufficient prior education, logistical issues, and state or institutional policies which make provision, enrollment, and completion difficult (Erisman and Contardo 2005). Prisoners may also lack motivation to complete correctional education because of previous discouraging educational experiences (Brazzell et al. 2009). While these factors affect inmates' choices to participate in such programs, behavioral economics may also explain the decision to forego correctional education. It is in the rational best interest of an inmate to enroll; yet as acknowledged in behavioral economics, people sometimes fail to make the most rational decision.

Behavioral economists advocate "nudge" policymaking, which benefits individuals who do not always act in their own self-interest while limiting burdens placed on those who act rationally. A nudge is defined as a type of "choice architecture" which predictably changes people's behavior "without forbidding any options or significantly changing their economic incentives" (Bhagava and Lowenstein 2015). In the case of correctional education, prisons may provide benefits like visitation, commissary, and sentence reduction in exchange for participation (Brazzell et al. 2009, 34). However, less tangible benefits are also effective. Nudges as simple as requiring inmates to sign a nonbinding participation agreement or a classroom behavior contract can motivate inmates to complete correctional education programs (35).

Some prisons require participation for inmates below a certain education level. For example, Maryland mandates that all inmates without a GED or high school diploma must enroll in education courses if they have at least 18 months left on their sentence (Maryland Department of Labor, Licensing and Regulation 2018). However, a recent movement in behavioral economics may provide an alternative to such a paternalistic system. For example, inmates could be automatically enrolled in classes, with the option to opt-out, which may significantly increase participation.

TRADEOFFS

As with any policy, there are tradeoffs associated with increasing provision of correctional education and nudging offenders toward participation. One of the major tradeoffs is the upfront expenditure. Correctional education requires an immediate investment to provide classes, teachers, etc., but the quantifiable benefits may not be observed for several years. Similarly, spending money to increase correctional education availability means that less money is spent on other potential public expenditures. For example, perhaps that money would be more effective at reducing recidivism if diverted to community policing, which has also had positive results (Executive Office of the President 2016). Another tradeoff is that some individuals who complete correctional education programs might commit crimes upon release. Furthermore, there is always a risk that research is incomplete or biased. If spending on correctional education does not reduce recidivism rates, the economic reasoning for the expense would be flawed. In any case, additional trials and careful evaluation could continue to increase confidence in the benefits (or lack thereof) of correctional education.

Correctional education programs are positively correlated with reduced recidivism,

economic savings, and higher post-release employment. Despite these promising outcomes, most of the research is correlational and thus limited in its ability to guide policy decisions. Experimental research with randomized control trials can help determine causal relationships between correctional education programs and the various social benefits or lack thereof. Until then, the only data available have identified a merely correlational relationship between correctional education and recidivism, so causality has not been definitively established.

IMPLEMENTATION

Congress would have to expand funding to implement a policy that increases the availability of correctional education. A new law would likely have to be passed to ensure that funds go directly to correctional education. If such a law was passed, there are a variety of offices and agencies that could accommodate the law and funding increases. For instance, the Office of Career, Technical, and Adult Education (OCTAE) is part of the federal Department of Education, and it administers and coordinates programs related to various types of adult education. The Office of Correctional Education (OCE), housed within OCTAE, already coordinates many correctional education programs around the country. OCE could oversee implementation of a new policy to increase the availability of correctional education (U.S. Department of Education 2016).

The nudge aspect of such a policy would have to be undertaken by the Department of Justice (DOJ). If a policy like this were applied to federal prisons, it would likely be the responsibility of the Federal Bureau of Prisons within the DOJ. However, the policy would ideally apply to state prisons as well since the federal recidivism rate of 34 percent is lower than that of many states (Federal Bureau of Prisons 2016). If applied to state prisons, it would be a larger undertaking and may require the creation of a new office or agency. Such a policy is much less likely to be enacted.

If a nudge policy were passed, the agency or department overseeing implementation could work with the Social and Behavioral Sciences Team (SBST) within the White House Office of Science and Technology Policy. SBST works with departments across the federal government to use insights from applied behavioral sciences, including behavioral economics. For example, SBST previously collaborated with the Bureau of Prisons to develop a reentry handbook. Together, they used behavioral insights to assist released prisoners in the most effective way (Social and Behavioral Sciences Team 2016). SBST would likely provide valuable insights into implementing an effective nudge policy related to correctional education.

It is possible to enforce policies which increase funding for and use of correctional education, as discussed. However, there would be significant challenges to implementing these policies. Because the prison system in the United States includes federal, state, and local jails and prisons, many of which are private, there would be substantial pushback and challenges involved. Furthermore, the government is not perfectly efficient. Many layers of bureaucracy would be involved in implementing new correctional education policies, which would complicate the implementation process and possibly diminish the positive effects of such policies.

CONCLUDING REMARKS

The high rate of incarceration in the United States leads to high levels of spending on incarceration. Reducing recidivism rates would help to curb this spending and would increase public safety. As noted, a multitude of studies have consistently demonstrated that correctional education is a cost-effective way to achieve such a reduction. While there is some debate in the literature over which type of correctional education leads to the greatest reduction in recidivism rates, there is a widespread belief that such education is a worthwhile investment. Not only is correctional education associated with reduced recidivism rates and increased employment rates for its participants, it is also a cost-effective public investment.

Considering the demonstrated benefits of correctional education both for offenders and for the public, it seems that the government should invest more heavily in such programs. Present bias and other principles from behavioral economics help explain why correctional education does not currently receive more funding. Because lawmakers have present bias, they may be reluctant to invest in correctional education now if the benefits will not be felt for several years. Recognition of present bias could help lawmakers implement a policy to increase spending on correctional education. Additionally, nudging policies could encourage more inmates to participate in such programs when they are available. These policies feature tradeoffs and possible implementation issues, but based on existing research, the benefits of correctional education appear to outweigh the costs.

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