

Implementing Postsecondary Academic Programs in State Prisons: Challenges and Opportunities

Stephen J. Meyer
Linda Fredericks
RMC Research Corporation

Cindy M. Borden
Penny L. Richardson
Northstar Correctional Education Services

Abstract

Participation in postsecondary programs in correctional settings is low, despite evidence of positive outcomes and national emphasis on postsecondary education to meet labor market demands. Research related to implementation of correctional education programs has focused on adult basic and secondary education programs while less is known about implementation of postsecondary programs. This article reports data from the first year of a 3-year national study examining the implementation and impact of a postsecondary academic program for youth offenders in state prisons. Information from student surveys; interviews and focus groups with students, administrators, and instructional staff; and classroom observations in five states during the 2008-2009 academic year is used to examine various aspects related to the implementation of postsecondary program in prisons, including program content, instructional delivery, and instructional resources and supports. Perceptions of program benefits, implementation challenges, and suggestions for improvement are also presented. Findings are discussed along with factors that should be considered for successful implementation of postsecondary programs in prison.

Background

The Increasing Importance of Postsecondary Education

Projections from the U.S. Department of Labor indicate that demand for jobs

requiring a postsecondary education will increase, with over two thirds of the fastest growing occupations requiring a postsecondary degree (Bureau of Labor Statistics, 2010). The Obama administration's American Graduation Initiative has recognized this changing economic landscape and has provided for the allocation of substantial investments in higher education with the goal of making the United States first in the world by 2020 in the proportion of residents with college degrees or certificates.

The relationship between educational progress and a range of economic and noneconomic outcomes for individuals and for society is well documented. Historically, college graduates have been well positioned to successfully enter the job market, and college graduates tend to earn more than their noncollege-going peers. For example, full-time workers between 25 and 34 years old with bachelor's degrees earned 60% more, on average, than their counterparts who were high school graduates (U.S. Department of Education, 2006). Other personal and public benefits associated with college completion include increased tax revenues, greater workplace productivity, improved quality of life for offspring, better consumer decision making, and decreased reliance on government financial support (Institute for Higher Education Policy, 1998).

The Promise of Postsecondary Education in Correctional Settings

The population of United States inmates in prison or jail has more than tripled over the past 25 years (Coley & Barton, 2006; Pew Center on the States, 2008). Approximately 2.3 million people are incarcerated, which amounts to more than 1 in 100 adults behind bars in an American jail or prison on any given day (Pew Center on the States, 2008). Contributing to this high rate of incarceration is the high recidivism rates for released offenders. Research on releases from state prisons during the mid 1990s suggests that within 3 years of release, 68% of former prisoners are expected to be re-arrested and 52% will be re-incarcerated (Langan & Levin, 2002). Given that nearly 700,000 prison inmates are released each year, and over 95% of those incarcerated at any given time will eventually be released into free society (Harlow, 2003; Harrison & Beck, 2006; Hughes & Wilson, 2002), efforts to reduce recidivism are critical.

Recidivism rates are lower for released inmates who are employed after their release (Adams et al, 1994; Solomon, Visher, LaVigne, & Osborne, 2006; Winterfield, Coggeshall, Burke-Storer, Correa, & Tidd, 2009); however, formerly incarcerated people often lack the resources to gain employment that pays a living wage (Travis, Solomon, & Waul, 2001). Prisoners are substantially less educated, on average, than their counterparts in the general population and

tend to reflect segments of the population that historically have had deficits in terms of educational attainment and achievement. Disproportionate numbers of prisoners are economically disadvantaged and are members of racial/ethnic minority groups, and many were unemployed or held low-paying and low-skilled jobs at the time of arrest (Harlow, 2003).

A large body of research has documented the relationship between participation in prison educational programs and reduced rates of recidivism, post-release employment and education, and other public cost savings, such as reduced criminal justice costs and reduced reliance on welfare and other public programs (Batiuk, McKeever, & Wilcox, 2005; Bazos & Hausman, 2004; Coley & Barton, 2006; Erisman & Contardo, 2005; Fine et al, 2001; Gaes, 2008; Jancic, 1998; MTC Institute, 2003; Nelson, 1995; Steurer et al, 2001). Programs that offer postsecondary correctional education have been shown to be especially promising for achieving these outcomes. A review of recidivism studies conducted during the 1990s showed that the vast majority found lower rates of recidivism for prisoners who had participated in postsecondary education while incarcerated. Recidivism rates for these individuals were, on average, 46% lower than for those who had not taken college classes (Chappell, 2004). Indeed, a growing body of literature suggests that postsecondary program participation results in lowered recidivism rates and other post release outcomes, such as higher rates of employment and increased earnings (Adams et al., 1994; Batiuk et al., 2005; Contardo & Tolbert, 2008; Duguid, Hawkey, & Knights, 1998; Lichtenberger & Onyewu 2005; Steurer, Smith, & Tracy, 2001; Tewksbury & Vannostrand, 1996; Wilson, Gallagher, & MacKenzie, 2000; Winterfield et al, 2009).

In addition to post release outcomes associated with postsecondary education programs, other benefits have been identified, such as changes in inmate behavior and attitudes and improved conditions in correctional facilities, including reduced disciplinary infractions, improved relationships among inmates and correctional staff, development of positive peer role models, and enhanced inmate self-esteem (Fine et al, 2001; Taylor, 1992, Winterfield et al., 2009). Given research suggesting that exposure to prison life and culture can lead inmates to adopt values and norms that reduce their ability to succeed in the community and labor market (Bloom, 2006; Contardo & Tolbert, 2008; Walters, 2003), these more proximal benefits may serve to mitigate negative impacts of incarceration.

Postsecondary Education Programs Offered in Prison

Fewer than one fourth of all state and federal inmates have completed any postsecondary education (Harlow, 2003). While the majority of federal and state prisons throughout the United States offer a range of education programming including literacy, basic education, special education programming, and secondary education, leading to either a high school diploma or certificate of equivalency, relatively few offer postsecondary education programs. Based on recent national surveys, postsecondary academic and vocational programs were available at between 35% and 42% of correctional facilities and approximately 5% of the inmate population participated (Erisman & Contardo, 2005; Stephan, 2008).

While approximately 60% of state prisoners and 73% of federal prisoners have the requisite education—a high school diploma or equivalency certificate—to participate in postsecondary programs, only an estimated 11% of the eligible prison population actually participates (Erisman & Contardo, 2005; Harlow, 2003). Most prisoners who enroll in postsecondary education are concentrated in a small group of prison systems, which tend to have large inmate populations and feature strong state-level support (Erisman & Contardo, 2005).

Information about the nature and extent of postsecondary correctional education programs (e.g., their prevalence, who participates, and how they are delivered) is limited because states and correctional facilities do not collect such data systematically and the available data are often not comparable across settings (Coley & Barton, 2006; Klein & Tolbert, 2007). A national survey of state educational administrators, conducted in the 2003-2004 academic year by the Institute for Higher Education Policy (Erisman & Contardo, 2005) provides the most comprehensive information about such programming and found that:

- Over 90% of students who received a postsecondary degree or certificate were enrolled in vocational programs.
- Nearly two thirds of postsecondary students were in credit-bearing vocational certificate programs. The remaining prisoners taking college classes were, for the most part, enrolled in Associate's degree programs.
- More than two thirds of programs were delivered in collaboration with local community colleges and most of the remaining programs were delivered by public or private 4-year colleges.
- Onsite instruction was the most frequent instructional method, but nearly half of prison systems offered some distance education programming using

video or satellite instruction. Internet technology was rarely used because of security concerns.

Research on the Implementation of Prison Education Programs

Several studies have examined the implementation of prison education programs, focusing on basic and secondary education programs and those that emphasize vocational skills. Studies have examined: student motivations and incentives for participation (Batchelder & Marvin, 2002; General Accounting Office [GAO], 1993; Heiser, 2007; Tewksbury & Stengel, 2006; Traverse, 2000); challenges of teaching in prison (Bhatti, 2010); perceptions of programs and instructors (Carr-Chellman, Beabout, Almeida, & Gursoy, 2009; Case & Fasenfest, 2004; Hall & Killacky, 2008; Spradling, 2000; Tewksbury & Stengel, 2006); suggestions for program improvement (Darling & Price, 2004; Moeller, Day, & Rivers, 2004; Traverse, 2000); and perceptions of the utility and impact of programs (GAO 1993; Heiser, 2007). These studies have tended to emphasize perceptions of students and instructional staff using surveys, interviews, and focus groups as data sources.

A much smaller body of literature has focused on implementation of postsecondary programs in prison. For example, a study of a postsecondary program in Indiana prisons used a survey of university course instructors to gather information about facility resources and supports for college programs (Edwards-Willey & Chivers, 2005). Interviews and focus groups with inmates, administrators, and staff in three California facilities were used in another study to understand reasons for low inmate participation in college programming (Walsh, 2000). Perhaps the most comprehensive study of the implementation of postsecondary programs in prisons was conducted by Winterfield and colleagues (2009). Using data from a sample of four facilities in three states, this study collected interview and focus group data from students and staff participating in academic and vocational college programs and focused on motivations for participation; enrollment; effectiveness and utility of programming; impact on self-esteem, attitudes, and preparedness for employment; challenges to success; and suggestions for improvement. According to the authors,

A consistent theme across respondents and locations was that postsecondary education (PSE) has a positive impact on inmate behavior and that participating in PSE increases feelings of self-esteem. Inmates typically believed that participation in PSE would increase their

employment prospects after release; however, many saw further education beyond that received in prison as necessary to reach their employment goals. Inmates reported a number of challenges to engaging in prison-based PSE; among them, the availability of quiet space to study, access to electronic resources, and lack of cooperation by correctional staff. (p. v).

While there is a good deal of information about implementation of education programming in prison, information about postsecondary education programming is limited. The majority of studies conducted to date focus on local samples of respondents, often with a small group of respondents in a single facility. Only one recent study of postsecondary programs presents a look at program implementation in multiple settings.

Toward a Better Understanding of Postsecondary Academic Program Implementation in Prison

This study builds on the research about postsecondary program implementation by examining implementation of postsecondary academic programs in 38 prisons across five states during the 2008-2009 academic year. The current analyses present selected findings from the first year of a 3-year study that is examining the implementation and efficacy of the Correctional Education Association College of the Air (CEA/COA) program. Through a partnership with the Correctional Education Association (CEA) and Milwaukee Area Technical College (MATC), the CEA/COA program offers general education/liberal arts and sciences courses leading to an Associate of Arts degree to students in prison. CEA/COA uses distance learning approach that combines the viewing of video lessons with study guides, workbooks, and other materials. A site coordinator at each prison acts as a liaison between students and the course instructor to deliver course materials, assignments, and examinations.

The study uses an experimental design in which prisons are randomly assigned to implement CEA/COA programming or other postsecondary academic programming that would normally be offered. During the 2008-2009 academic year, the study collected quantitative and qualitative data to evaluate the impact of CEA/COA and to support the development of the program. Analyses in this article address the following questions related to postsecondary academic programs in state prisons:

1. What are the characteristics of students in postsecondary academic programs?
2. What program content and instructional delivery comprise these programs?

3. What types of instructional resources and support are available to students?
4. What benefits for students and for institutions are associated with participation?
5. What factors interfere with successful implementation and what suggestions do students, educators, and administrators have for improving programs?

Methodology

Data for the study were collected during the 2008-2009 academic year in a sample of 38 state prisons in five states. Each state had between six and nine prisons participating in the study. Baseline and follow-up data collection was used to collect information at the beginning and end of a two-semester academic year. Baseline data were collected in August and September 2008 and follow-up data were collected between March and May 2009.

Sample

Prisons (sites) in the sample were selected for a study of the CEA/COA program to provide geographic diversity and to include sites with a high concentration of youth offenders, the infrastructure to provide postsecondary academic instruction, and willingness to be randomly assigned to implement the CEA/COA program or other postsecondary academic programming. Thirty-eight sites in the following five states were selected: Iowa, Massachusetts, Nevada, Oklahoma, and South Carolina. Twenty prisons in the sample were randomly assigned to implement CEA/COA programming. Six were women's facilities and just over half were medium security facilities—the other half included roughly equal proportions of minimum security facilities, maximum security facilities, and facilities with multiple security levels.

Designated site coordinators at each of the 38 sites were asked to recruit a minimum of 15 students to participate in postsecondary academic programming. Criteria for participation in the study included requirements that students: be between 18 and 25 years old; have a release date of between 1 and 5 years; have a high school diploma or equivalent; and have tuition costs paid with external grant funding. These criteria corresponded to the criteria for participation in the federal Incarcerated Youth Offender (IYO) grant program, which funded the costs of tuition, books, and supplies for most participants in the study during the 2008-2009 academic year.

The sample used for the quantitative data analyses presented in this report includes students who were recruited for the study and who participated in both baseline and follow-up data collection by completing either the study

survey or the Collegiate Assessment of Academic Proficiency (CAAP) Critical Thinking Test (ACT, 2010) at both points in time. The sample includes 259 students from the 38 prisons that participated in the study during the 2008-2009 academic year. About half (45.2%) of students in the sample were in CEA/COA sites and each state was represented in the following proportions: Iowa (21% of the sample), Massachusetts (21%), Nevada (15%), Oklahoma (17%) and South Carolina (27%).

The sample represents roughly half of the students who were initially recruited for the study. Reasons for student attrition between baseline and follow-up data collection included inmate release/parole (26%), transfer (28%), and unavailability for follow-up data collection (46%). Students who were unavailable for follow-up data collection included those with movement restrictions (e.g., who were in lock-up or segregation), those who had conflicting activities during the data collection visit, and those who did not attend or refused to participate in follow-up data collection activities. Nearly three fourths of the students in this latter group never enrolled in courses after being recruited into the study or withdrew from postsecondary programs before completing any courses.

Qualitative data collected in a representative sample of case study sites are also presented. A stratified random sample of two CEA/COA sites and one control site was selected within each state for onsite baseline and follow-up qualitative data collection, resulting in a total of 15 case study sites (10 CEA/COA sites and five control sites in five states). At each case study site, interviews were conducted with the site coordinator. Five administrative staff members from state offices who were involved in site coordination were also interviewed. A focus group with randomly selected students was also conducted at each site. Student focus groups ranged in size from three to eight students. During the follow-up case study site visits, observations of instructional activities were conducted in 13 of the 15 case study sites. Eight were CEA/COA sites and five were control sites.

Measures

Collegiate Assessment of Academic Proficiency Critical Thinking Test

The CAAP Critical Thinking Test was administered to students during baseline and follow-up data collection. The CAAP is a standardized assessment program that is designed to assess and evaluate postsecondary general education programs (ACT, 2010). As a national standardized assessment, the CAAP offers national norms that allow comparison to typical American college students. The

Critical Thinking Test includes 32 multiple-choice items that measure skills in clarifying, analyzing, evaluating, and extending arguments.

Student Survey

A survey was administered to students during the baseline and follow-up data collection. The student survey was developed based on a review of research conducted on prison education programs. The review included studies that:

- Examined related constructs, such as factors that affect participant motivation, components of correctional education programs, and institutional characteristics;
- Sought to identify factors associated with participant success and best practice; and
- Used survey instruments with similar respondent groups (Meyer, 2008).

The survey was used to collect information about progress in postsecondary programs, instructional programming (e.g., content coverage, program resources, and support), and student background characteristics.

Case Study Data Collection Protocols

Case study data collection protocols were used to conduct site coordinator and administrator interviews, student focus groups, and classroom observation. Interview and focus group protocols were designed to complement quantitative measures and to collect detailed information about program content and delivery, supports and resources for students, perceptions of progress, factors that served to facilitate or impede progress, and suggestions for improvement. A classroom observation protocol was used to provide detailed information about what program implementation looked like in practice. Information was collected about characteristics of the learning environment, how resources were used, the types of activities and interactions in which students were engaged, and the role of instructors and prison staff.

Analysis

Descriptive statistics were used to summarize findings from the CAAP test and student survey. Specifically, means of CAAP test scale scores and response scales for individual survey items were computed to provide descriptive information about program implementation. Qualitative data collected through interviews, focus groups, and classroom observations were analyzed using an

approach that closely follows methods explicated by Miles and Huberman (1994). Audio recordings were made of interviews and focus groups and the recordings were transcribed. Cross-site data from these transcriptions and notes from observations were organized into data matrices, based on clearly-defined study variables that were linked to the research questions. The data matrices were used to identify common themes and representative respondent comments across sites.

While subsequent work will explore differences between CEA/COA and control sites, these distinctions are not explored for the present analyses which are designed to characterize program implementation across a variety of program types.

Findings

This section begins with a characterization of the student sample to provide context for interpreting findings, followed by information on program content and instructional delivery, and support for participation in postsecondary programs. Next, findings are presented related to perceptions of program benefits, challenges to implementation, and suggestions for program improvement.

Characteristics of Students in Postsecondary Academic Programs

Student Demographics

Information about the characteristics of students in the study who began postsecondary academic programs was collected using the student survey. The average age of students was 22.5. Exhibit 1 shows that over three fourths of students were male and that the majority of students identified themselves as White/Caucasian (46%), Black/African American (37%), and Latino/Hispanic (11%). Compared to national statistics for state prisons (Stephan, 2008), the sample had a greater proportion of female students and students from the White/Caucasian, American Indian/Alaskan Native, and Asian or Pacific Islander groups. Most students were never married and nearly 40% of students were parents. The majority of students (55%) reported that they received a high school equivalency credential while in prison and a small proportion (4%) indicated that they had neither a high school diploma nor an equivalency credential . Thirty-five to forty percent of students indicated that at least one parent had some experience in college; however, the number of students with parents who had completed degrees was smaller. More than one fourth of students reported that either their mother or father had not completed high school.

Exhibit 1. Student Demographics (N = 259) (see EXHIBIT 1)

Prior Postsecondary Participation

Nearly two thirds of students indicated that they had not participated in postsecondary programs prior to the 2008-2009 academic year. Among those who reported having participated, the average number of courses they successfully completed ranged from 0 to 40, with an average of 5.1.

Baseline Academic Achievement

Baseline CAAP Critical Thinking Test scale scores ranged from 50 to 71, with an average of 58.8, which is just below the 50th percentile based on norms associated with a national sample of sophomores at 2- and 4-year colleges and universities in the United States. These baseline scores indicate that study participants, most of whom had no prior college experience, had critical thinking skills that were close to those for a typical American college sophomore.

Program Content and Instructional Delivery

During the 2008-2009 academic year, 82% of students successfully completed at least one course, and the number of successfully completed courses ranged from 1 to 9. The average number of completed courses was 2.5.

Program Content

In focus groups and interviews, students and site coordinators were asked about the types of college courses that had been given during the 2008-2009 academic year. Students in the CEA/COA sites took freshman- or sophomore-level liberal arts courses in English composition, sociology, economics, psychology, political science, history, and environmental science. Students in control sites participated in similar types of courses offered through local colleges. At one control site, vocational classes in welding were offered along with postsecondary academic courses.

The student survey also asked students to indicate the extent to which their courses covered various subjects during the 2008-2009 academic year, ranging from core academic (e.g., reading and mathematics) to noncore academic (e.g., employability or life skills and art/music). Exhibit 2 shows that, on average, communication skills (i.e., writing, spelling, or grammar; listening or speaking; and reading), critical thinking skills, and social science topics were emphasized most. Mathematics, science, computer science, art/music, and English as a second language were emphasized least.

Exhibit 2. Course Content (see EXHIBIT 2)

Instructional Delivery

In CEA/COA sites, courses combined the viewing of video programs with readings and assignments from texts and study guides, workbooks, and CD-ROMs. Written assignments and multiple choice exams were sent to the instructor by a facility site coordinator for grading and written feedback. Students were also able to contact the instructor with questions via telephone, e-mail, or facsimile through the local site coordinator. In control sites, course delivery included both direct instruction by local college faculty and distance learning programs, which consisted of interactive telecourses and correspondence courses. While many students in correspondence programs in control sites pursued their studies independently, facility staff members were often involved in distributing course materials, returning completed assignments to course instructors, and proctoring exams.

Exhibit 3 shows average student survey ratings of the frequency with which they engaged in various instructional activities. Students reported that they most frequently learned on their own. While students indicated that they had discussions with other students about what they learned, they tended to work with and receive support from others either rarely or occasionally. Students were least likely to be taught by a site coordinator or other facility staff member, to listen to audio lessons, and to access Internet/simulated Internet resources.

Exhibit 3. Instructional Delivery (see EXHIBIT 3)

Classroom observations were conducted at eight CEA/COA sites and five control sites. While these "point-in-time" observations provide only a snapshot of what was occurring on a particular day, they help to illustrate the ways in which instruction was delivered. All observations took place at a designated location at the prison, with the exception of one, which was held offsite on a community college campus. In all but one CEA/COA site, the site coordinator or other administrator was present. In four of the control sites, the class was led by a course instructor and in the fifth, students worked on their own. The physical space for instruction varied across sites, but all sites offered a location where students could attend lessons and hold discussions. Students at most sites had access to a library. Most classrooms had a television and VCR or DVD player and about half had computers.

In the observed classes, students were engaged in several activities, including watching prerecorded lessons, participating in lessons led by an

instructor or site coordinator, discussing course topics, and reviewing course assignments and tests. While site coordinators were present during classroom observations at most sites, they were involved in the lessons to varying degrees. Some provided hands-on instruction, support, and encouragement, while others primarily facilitated access to the prerecorded lessons. Site coordinators who were more engaged with postsecondary programming led discussions, provided targeted support to address student needs, and communicated with offsite course instructors to provide feedback to students.

Two sites featured inmate clerks who helped with managing delivery of instruction, facilitating discussions, and tracking student participation. Student engagement varied across sites, with some students being highly engaged and others appearing to be bored and distracted. Peer support varied substantially as well. In some sites, students were engaged in discussion and supported each other's learning, while in others, students pursued their studies independently.

Roles and Responsibilities of Site Coordinators

Site coordinators were asked to describe their roles and specific responsibilities with respect to educational programming within the prison. The most common site coordinator roles and associated responsibilities are presented below:

- Recruiting Participants (e.g., helping students obtain the GED Test credential, recruiting college applicants and peer tutors, orienting new inmate arrivals, discussing opportunities for college, evaluating student files, and placing students in appropriate classes);
- Class Instruction (e.g., teaching classes in mathematics, reading, writing, GED Test preparation, English as a second language, work readiness, typing, vocational computer skills, and life skills);
- Monitoring Student Work or Assessment (e.g., providing approvals for students to come to class, administering assessment tests to determine eligibility for classes, filing evaluations; facilitating assignments and tests between colleges and prisons, and proctoring exams); and
- Managing Student Records (e.g., submitting information to a statewide database, managing student records and paper files).

Less frequently mentioned roles, identified by only one or two individuals, were working with external groups or individuals to make programming available; facilitating communication between inmates and educational

institutions or faculty; tutoring or providing other types of support to inmates; and installing and managing technology, such as satellite equipment and DVD players.

Support for Participation in Postsecondary Programs

Students and site coordinators were asked about the types of support for student participation in postsecondary programming that had been provided to students. Encouragement from families and peers was discussed most often by students. Other types of support that were mentioned included encouragement from education and other prison staff, support from tutors who were usually other inmates, and instruction by teachers who cared about student success. Types of support mentioned less frequently were efforts on behalf of the prison to publicize available courses, provision of a computer lab, free tuition and books, access to a library, and encouragement from a local company that took vocational students on a tour of their facility. Respondents in two groups reported that they did not receive any support from the prison staff. Some respondents mentioned "self-supports," which included having the opportunity to see the psychological benefits of an education and becoming a positive role model for their family or children.

While students at one site reported that the site coordinator was not helpful, most comments about site coordinator assistance were positive. Some students also discussed having received support from correctional officers, such as officers helping to keep students out of lock-up so that they could attend classes or encouraging inmates to enroll in or attend college classes. However, at slightly less than half of the sites, students also described indifference or hostility from correctional officers. These students said that correctional officers made negative comments about their education and sometimes prevented students from attending class or impeded their attendance. Among site coordinators, two mentioned efforts by security staff to support inmate participation in college, such as bringing meals to inmates who had class during meal time or helping inmates go through different checkpoints to be able to arrive at classes. One coordinator reported that officers resented inmates participating because they lacked the opportunity to attend college themselves.

Student comments about support included:

[I received] a lot of encouragement and support from my sister, my mom, and my grandma. They're all real proud of me, about getting into it, getting an

opportunity . . . to take courses.

In this program, I could see that the peer support was really going to be most necessary. . . The teacher himself or herself was going to be in a completely different state. It's going to be a matter of everyone working together— otherwise none of us is going to get through it.

The staff members . . . [the] administration . . . really care about whether you go to school or not.

Our educator . . . he went above and beyond, I think, what he was really expected to do for the history class. I mean he sat with us and talked to us. Any questions that we had, he was willing to sit and talk to us.

I was going through a really personal time in my life and I did not want to get up and go to class, and the [correctional officer said] "Get up and go to class. What would your grandma say? Get up and go to class."

[Correctional officers] look at you sometimes like we can't do it, like we [are] just wasting our time.

Site coordinators also described several supports and incentives that were available to students in postsecondary programs. The most frequently mentioned was provision of good time credit (i.e., credit toward time served that results in an earlier inmate release date). For example, in one state, there was a statewide policy that gave prisoners two and a half days a month of good time credit for postsecondary courses with satisfactory attendance and participation. In another state, the completion of college classes was an important factor considered by parole boards. Site coordinators at most sites also indicated that either tutoring or counseling was provided and that students had access to a library with reference materials. Fewer sites had a study room and/or classrooms dedicated to postsecondary programming. Other incentives included payment to inmates to attend school, free books and school supplies, and assistance with post-release college enrollment.

When asked about support for postsecondary education received from the warden, education staff, and custodial/security staff, all but one of the site coordinators indicated that the warden was supportive of efforts, and the majority felt that education and custodial/security staff members were also largely supportive. One respondent said that staff at a high security building with violent offenders was not supportive because of overriding concerns with

security. Another respondent thought it was unfair for prisoners to be given educational opportunities that were not available to him. Some site coordinator comments about this topic follow:

Administration can make or break education; lock-'em up wardens give you nothing. We have a good supportive warden here. [It] filters down all the way to support staff.

[It's] negative . . . offenders get education when I don't.

[The warden] has tried to put in place methods to try to get the guys to come to school every day. As in, if they don't come, they are exercised out in the very cold weather to try to convince them to come to class.

You have a lot of people [who are] forward thinking enough to see that maybe an education will keep someone from ending back up in prison as opposed to just making them turn big rocks into little rocks all day.

Students were asked to rate the extent to which a variety of instructional resources were present and available to them. Exhibit 4 shows that students tended to agree that they felt safe in their learning environment and had opportunities to study outside of class. Average ratings showed only moderate student agreement that there were quiet places to study, that books and learning materials were easily available, and that the prison made it easy to participate in college programs. Students were least likely to agree with statements about the availability of tutoring and advising, useful materials in the library, and computer access.

Exhibit 4. Instructional Resources (see EXHIBIT 4)

Perceptions of Benefits Associated with Postsecondary Programs

Positive Aspects of Programs

When asked about the positive aspects of postsecondary programs, students most frequently mentioned that they liked having an opportunity to gain knowledge, face a positive challenge, and become a better person. Students also mentioned that they appreciated:

- The feeling of independence;
- Being part of a group that was motivated to succeed;
- Having coursework with no cost associated that led to a degree;

- Being invited to participate in the program;
- Feeling respected by others;
- The self-paced instruction;
- Having a syllabus that provided clear expectations; and
- Getting new textbooks.

Students comments included:

I enjoyed the fact that we had to learn about government and politics. It's something that always kind of interested me. I learn[ed] a lot of terminology and I learned about the Constitution. We did a modified version of the Constitution as a project and I actually found that to be really fun . . .

One thing I like is that it's on your own schedule. Really, you define your own time.

It's been a real good experience, I mean, because it gives people a chance to do things that they weren't normally able to do before their incarceration. You know . . . you can just sit down and actually try to learn something, soak up a lot of new things, and then be able to get a degree to go out and apply it to the world. That's really beyond blessing right there.

It makes you feel good to know that just because you're inside a fence or whatever, that there are people out there who don't think of you as just a number and that are willing to help, you know. It kind of makes you feel good to know. It kind of gives you a little hope . . .

Site coordinator comments about positive aspects of postsecondary programs were largely parallel to those of students. They identified furthering inmates' education knowledge, the ease of delivery associated with distance learning programs, giving students some degree of independence, having study guides, and offering courses needed for general education as positive aspects. Some site coordinators in sites with distance learning programs mentioned that the ability of students to study and take tests on their own time was an advantage and that, in some instances, it was the only way that postsecondary classes could be offered. Administrators also identified this benefit, mentioning that distance education programs provided an affordable way to deliver classes, allowed delivery of more courses than could be given otherwise, and helped to bring programming to remote, rural sites. One coordinator at a site where direct

instruction was provided mentioned that the involvement of the professors with the students was a positive aspect, particularly the ability of students to get their questions answered immediately.

Outcomes for Students and Institutions

Site coordinators and students were asked to identify outcomes associated with student participation in postsecondary programs. Most site coordinators identified positive changes in the areas of improved student attitudes, behaviors, and skills such as:

- Reduced behavioral problems and detention;
- Improved ability to abide by behavioral norms in the classroom;
- Increased confidence, motivation, self-discipline, and maturity;
- Improved self-image and grooming;
- Improved communication skills and willingness to engage in thoughtful conversations;
- Improved logical thinking skills; and
- Higher ambitions.

While the impact of postsecondary programming on the climate of prisons likely depends a great deal on the number of students who are able to participate, site coordinators also identified several positive changes. About half of the site coordinators described improvements in relationships among inmates or between inmates and institutional staff. Other outcomes identified by site coordinators included:

- The encouragement for others to learn and grow;
- Stabilization of inmate behavior;
- Inmates being more supportive of each other;
- Inmates becoming more responsible in facility jobs and seeking higher level jobs; and
- Positive influence on hearings with parole boards.

Site coordinators shared the following comments about outcomes for students and institutions:

I think [students] have become aware of the importance of [education] and how good it can be for the future—that this is a stepping stone leading to something else.

I think that one of the main things would just be the maturity level. As they complete some of these courses, they are...more level headed and thinking about what they need to be thinking about.

Older inmates who are pro-education push younger ones to go to school. Family members push each other. The maturity curve affects the whole institution.

There's better interaction and talking.

The idea that peers can excel [creates] respect, incentives, and better behaviors.

Students were also asked to identify what they had gained from their participation in postsecondary programs and indicated that they had acquired:

- Improved study skills and test taking ability;
- Improved writing and content knowledge;
- Improved social, communication, presentation, and critical thinking skills;
- Improved relationships with peers;
- Increased willingness to interact with and help out others in the program;
- Increased self-esteem;
- A sense of accomplishment; and
- The ability to be a role model for others.

Student comments about outcomes included:

People see me studying in my cell and come up and ask me questions. [They] ask me to tell them about college and the classes.

I like to learn things. I've just never made the right choices to do things. It's made things a lot more exciting for me. I can see things in a new light.

It's nice to bond with inmates going in a positive direction.

You're exposing guys to things they never thought were possible for them, you're giving them an opportunity to show that they can still do something that isn't illegal.

We have people like our professors.. . . When you have people that care about you and about you succeeding, you are able to care for someone else. You motivate. When you are motivated, you help motivate the next man...

Students and site coordinators also identified outcomes that extended beyond the prison. They saw higher education as a powerful motivator to help inmates become stable, productive, and law-abiding citizens. They viewed higher education as a cost-effective means to prevent recidivism. A few of their comments are presented below:

If you don't have an education then you don't have a job, and if you don't have a job then you don't have money, and if don't have money, well, we're going to go to the corner and we're going to find somebody to hook us up with something.. . . I'm serious, that's how it goes. We don't want to do that any more.. . . It's never too late to, you know, try over again so I think it's great to know that just because you're convicted of a felony [it doesn't stop you] from going out and doing big things in society when we're released. – Student

It won't put more prisoners in society; it will put better people back out there.. . . More fathers [will be] taking care of their responsibility at home, paying rent, buying homes. – Student

Ninety-nine percent come back to the streets. If we can return them as tax-paying citizens, aren't we all better off? If we can break the cycle of generational illiteracy, isn't that a no-brainer? – Site Coordinator

I mean . . . won't people rather us try to better ourselves while we're in prison so that when we get out we stay out instead of having to come back and back and back? Because regardless of why we're here, or what people may think, we still want better things for our future. – Student

Challenges Associated With Implementing Postsecondary Programs

When asked what they disliked about their postsecondary programs, students in sites with distance learning programs tended to emphasize the lack of interaction with an instructor. They felt it was difficult to remain motivated without an instructor and disliked the absence of real-time feedback. Students were also frustrated that they could not ask questions or receive answers except through the long and cumbersome process of conveying questions through a site coordinator. Students in some sites described course videos and textbooks as being outdated and some said that expectations for student

achievement were unclear. Other negative aspects that students identified were:

- Limited reference materials in the library;
- Lack of introductory materials in some courses to clarify learning goals and course expectations;
- Late receipt or unavailability of textbooks;
- Inadequate preparation to take college-level classes;
- Lack of a place to study and limited time for study;
- Lack of choice in courses, course cancellation, and limited funding to take multiple courses;
- Delays in receiving feedback on coursework and receiving grades; and
- Unconstructive critical feedback from an instructor.

Student comments about what they disliked included:

It's very limited, [the] programs available here. [For] the programs that are available, it takes 2 years to get into a substance abuse program. So not having to actually pursue and hunt people down to get into the program and to actually be invited meant a lot to me personally.

Without having a teacher here to help you and say you're doing it right and doing a good job, it's difficult to keep your motivation up.

I read all the books, I learned the materials, I re-read the study guides, but . . . without that focus or attention [by an instructor], I think all of it crumbles apart.

There's really nowhere you can go [to study].. . . There's people constantly around you.. . . I even tried you know wearing the headphones and stuff, but that doesn't work...

Our classes get cancelled all the time. Like last semester, the warden cancelled our math class . . . we were half way through and he said, "Oh, no, we're not doing this any more." I don't know what it was, but that's happened a couple of times.

Among site coordinators and administrators, many of the same issues were identified, including:

- Absence of direct instruction and little or no interaction between students and instructors;

- Unpreparedness of students to do college-level work;
- High level of difficulty associated with some course papers and exams;
- Lack of tutoring and other support for students;
- Shortage of research materials;
- Uncertainty about site coordinator roles and expectations;
- Limited correlation between information in lessons and content in books; and
- Lack of responsiveness to student questions from some instructors.

Several site coordinators and administrators emphasized that the lack of college readiness among students created challenges and felt that students needed a high level of self-discipline to be successful. In addition, some site coordinators expressed frustration that there was no extra compensation given to them for the responsibilities associated with postsecondary programming and that no other work was taken away to compensate for the additional demands on their time.

Site coordinator and administrator comments included the following:

One of the things that is very true is [that] most of these [inmates] have not had much high school experience to bridge into doing college work.

From the beginning of it, we didn't really know what the ground rules were...I don't know if this would have been the thing to do, have a 2- day seminar saying this is what the expectations are... We really didn't know enough about the program.

[Students] are looking for something to explain something in the book they're reading. So, [the prerecorded lessons] are not very relevant to what they're trying to learn.

Our offenders [are] not prepared to take independent study classes [for] a number of reasons. Many have been away from school for 6 to 8 years and have not been in any class. College classes often require students to write papers [while] almost none of our students have experience in writing a term paper. Most dropped out in early high school and have no idea how to organize a term paper. The independent study skills are severely lacking . . . they are not sure where to start when given a syllabus. The text book is overwhelming. They do not know how to

pick out important details. Students do not know how to take notes from a video or a book. Students do not know how to organize their time. They do not realize that you must study 2 or 3 hours for each hour of class.

Students were asked to report the frequency with which various factors interfered with their learning in postsecondary programs. Exhibit 5 shows that lockdowns and counts and closure of school facilities were identified as the most frequent impediments. Other impediments such as segregation or detention, custody changes or transfers, and participation in vocational programs, were identified as happening only rarely.

Exhibit 5. Factors That Interfere With Learning (see EXHIBIT 5)

Suggestions for Improving Postsecondary Programs

At the end of the 2008-2009 academic year, students, site coordinators, and administrators were asked to provide suggestions for improving postsecondary programming. Students in distance education programs suggested that these programs include a direct instruction component or that an instructor from a local college come into class to give guidance about course content. They also emphasized that regular feedback from instructors would be helpful. Other suggestions from students included:

- Increase access to computers and research materials and providing Internet access;
- Provide classes that prepare students for college-level courses, including instruction related to study skills;
- Expand funding and course availability so more inmates could participate;
- Improve explanations about course format and expectations and providing them before classes begin;
- Provide a quiet place to study and dedicated classroom space;
- Have a tutor or coordinator to help the students;
- Have more class time to allow for discussion among students after viewing a prerecorded lesson;
- Offer more courses and having them grouped together so that inmates could obtain a specific certification or degree;

- Give a realistic picture of expectations to let students know they have to be self-motivated and mature to succeed; and
- Conduct better screening to ensure that students are sufficiently prepared and committed to learning.

Some of the student comments were:

I know that they have a college which is nearby . . . maybe an instructor there . . . can come in and make sure we're kind of following the guidelines of what the teacher may expect.

There's more than enough ambitious inmates that would like to participate in the program because they see the advantage . . . but it's not available to them because the program is so limited. Many of them [do not qualify to participate] because of their age.

I think the instructors . . . should keep in contact. We should have a way to contact them or [for them to] contact us. [We need to receive] a little feedback . . . what we could work on, what we need to work on, or what we're good at . . . because not even the people who are helping us really know what the instructors are looking for.

I know it is hard to find volunteers, but if they could find a volunteer that's actually majored in [content related to the courses] . . . somebody that you could actually talk to about what we're learning, that would be nice.

Site coordinators and administrators identified the need to address two overriding concerns: the lack of interactive education for inmates, which often led to frustration, boredom, and attrition; and the need for study skills assistance for a substantial number of students. Site coordinators suggested that there be some kind of direct communication between inmates and offsite instructors, such as programs done through videoconference, phone calls placed between students and instructors, or having an instructor come to prison on occasion and conduct face-to-face sessions. One site coordinator pointed out that his institution also contracted with a community college to present classes through interactive video, and that students were very pleased with that format because they could see the instructor and ask questions. Another coordinator described plans to offer a college preparation course through a partner college for students who lacked requisite study skills.

Site coordinators and administrators also made the following suggestions:

- Offer more class choices and include a mandatory study skills component in the curriculum;
- Provide a preparatory course in college-level reading and writing;
- Make less challenging classes available for students making the transition from GED certification to college;
- Provide more computers, research materials, and study space for students;
- Better organize classes to lead to a certificate or degree and to provide marketable skills;
- Offer clearer guidance from the partner college about the support expected from the prison;
- Provide sites with the option to purchase used textbooks;
- Provide more basic supplies such as notebooks, folders, pens, and books; and
- Allow inmates in college programs to avoid institutional transfers while enrolled.

Comments from site coordinators and administrators included:

I think that somehow, somehow, we have to come up with some kind of bridge that's going to allow these students to be able to hone their skills and . . . acquire the skills that are necessary to be able to do college-level writing and develop intellectual thinking skills.

We found that we needed somebody there, either a site coordinator or myself, not only to encourage them but to say, did you get that paper in? [There had to be] deadlines, you know, to really push and to make it work.

I think that with [the academic college program], the courses are set, but I don't see a specific program that the offender is involved in that's going to lead to possible employment or an Associate's degree. In our vocational program, they are certified programs through the community college. Once the offenders have completed the program, they do have skill levels to enter into an apprenticeship.

To be truthful, dealing with the type of students that we are dealing with, I do believe they need more face-to-face instruction. I really don't believe the video

aspect of it is working for them.

I think it is just really important that we make sure the students have a reasonable chance of success before we sign them up. I think that some of the sites did not do a good job of testing and interviewing the students before they put them in. I feel sad about that because now you've given these students, who probably have a long history of failure, one more failure instead of success, which is what we wanted to give them so that they could understand that they could do something different. So I am hoping that we can maybe do a better job of screening before the students sign up.

One coordinator from a site with a distance learning program reported making classes more engaging by having all students bring their books to class, read the assigned chapter beforehand, watch the video together, jointly answer questions in the workbook, and then discuss any questions or issues that they had. At another site, the staff helped to ensure student readiness for college-level courses by giving asset tests to all potential students to see if their skill level matched the demands of college courses.

Two administrators said that sites with distance learning programs were more difficult to manage than those served by local community colleges because there were many administrative responsibilities that were assumed by the site rather than the local college. For example, at some sites, staff from local community colleges oversaw classes and informed prison administrators about enrollments, dropouts, and reimbursements. At sites with distance learning programs, these responsibilities were often assumed by educational administrators without any compensation. They also felt that there was insufficient training for site coordinators and not enough feedback on student progress.

Discussion

Comments from students, site coordinators, and administrators suggested that postsecondary programs at study sites have strong potential to achieve outcomes for students and institutions. Site coordinators identified improvements in student behavior and attitudes, including increased confidence, motivation, self-discipline, and maturity. Students mentioned improved study skills, improved social, communication, and critical thinking skills, and increased self-esteem. Students and site coordinators mentioned that there were improvements in prison climate, including improved relationships

among students and between students and institution staff. Several issues were identified, however, that presented substantial challenges to program success and that have implications for improving postsecondary programming at correctional facilities.

Considerations for Implementing Postsecondary Programs in Prisons

Student Readiness for College-Level Work

According to students, site coordinators, and administrators, many students were unprepared for the level of work expected of them in college courses. Assignments and exams in several courses were described as being too difficult, particularly for those students who did not finish high school and who completed a high school equivalency credential (tests of General Educational Development or GED) while in prison. The courses that students completed for the GED were described by several respondents as inadequate preparation for college courses. In particular, respondents mentioned that students needed to have more advanced study skills and writing ability. College students in prison are not alone in this regard; research based on a national sample of community college students found that nearly 60 percent took at least one remedial or developmental course (Bailey, 2008). Several suggestions were made by respondents including: offering a mandatory study skills course, providing less challenging courses for students who are making the transition from GED certification to college, and providing a preparatory course in college reading and writing. Sites in two states began to address this issue by providing a college preparation course during the second semester of the 2008-2009 academic year. In settings where student readiness is an issue, administrators should consider ways to enhance development of college readiness skills as part of student preparation for high school equivalency and/or concurrently with delivery of college courses. Inmate tutors or other volunteers might be also recruited to provide targeted support to address those areas of highest student need.

Coverage of Science and Mathematics Topics

Responses to the student survey indicated that coverage of mathematics and science topics in courses was limited. Given increased public concern about the need to develop student knowledge in science, technology, engineering, and mathematics (STEM) fields and shortages in the STEM labor force (e.g., Mullins, Martin, & Foy, 2005), these areas are important to address. Postsecondary programs in prison should explore ways to better integrate these topics into

their curricula and to facilitate student readiness for these types of courses.

Identification of Student Participants

Student comments suggest that they were grateful for the opportunity to participate in college courses and were highly motivated. Many students made compelling statements about improving their lives, making others proud, becoming a role model, and staying out of trouble in the future. However, some students seemed to lack the motivation or commitment needed to succeed, which may reflect frustration with their unpreparedness and lack of support for completing courses. Site coordinators indicated that students who were successful were those with strong motivation, self-discipline, academic ability, and maturity. Site coordinators also emphasized that successful students had: the ability to collaborate with other students on learning activities, strong reading ability, good social skills, and the ability to pay attention. Students also suggested that potential participants be screened for ability and motivation and suggested that a clear description of expectations be provided. These comments suggest that administrators should take additional steps to ensure that students are sufficiently prepared for and committed to learning before being accepted to participate in a college program. Students might be required to demonstrate achievement on locally-administered assessments or successfully complete college readiness courses or exercises prior to being admitted to postsecondary programs.

Role of the Site Coordinator

The vast majority of students reported that they valued efforts by institution staff and fellow inmates to encourage them to participate and complete courses and they expressed a desire for additional support. Comments from site coordinators and classroom observations indicated that there were substantial differences in the way that site coordinators viewed and carried out their roles as administrators of postsecondary education programs. Some served primarily in the role of a program administrator (e.g., managing communication with course instructors, arranging for lessons to be viewed by students, and administering exams), while others took on a more direct role in supporting student progress (e.g., fostering student motivation, leading discussions with students, and providing targeted support to address identified student needs). Given that the educational and experiential background of site coordinators varied, it might be that they were more or less able to provide this type of direct support or they might have had other assignments that limited the type

of support that they could provide. Coordinators of postsecondary programs should be carefully identified to ensure that they have sufficient interest, ability, and time to successfully facilitate these programs. Site coordinators might also be given opportunities to share successful practices and additional guidance about ways they can support student progress. In sites where the site coordinator lacks the capacity to provide additional support, s/he might be given guidance on how to foster support among inmate students or how to identify outside instructors or tutors who can help students succeed. This is particularly important in sites with distance learning programs in which students have limited contact with course instructors.

Institutional Incentives and Supports

Students and site coordinators generally reported that institutional support for participation in postsecondary programs was strong. The provision of good time credit was often cited as an incentive for students, for example. There were differences in the institutional resources available across sites, however, and student survey ratings and comments in focus groups suggested that there was a need for tutoring and advising support; opportunities to discuss lessons with other students; access to more research materials; quiet places for study, computers, and supplies, such as folders, pens, and books. Some respondents also suggested that additional institutional supports be provided by limiting inmate transfers for those participating in postsecondary programs and coordinating activity schedules to minimize conflicts with the timing of courses. Administrators should endeavor to understand and address student concerns and factors that impede their success in postsecondary programs.

Understanding Goals and Objectives of Postsecondary Programming

While site coordinators tended to agree that wardens were supportive of educational efforts, this support did not always extend to other staff at the prison. At some institutions, students reported the significant role that correctional officers played in encouraging them to enroll in or attend classes. In other institutions, students indicated that correctional officers were either indifferent or sometimes outwardly hostile to the idea of inmates receiving postsecondary education. This suggests that correctional officers in some institutions may benefit from additional opportunities to understand the goals and objectives of postsecondary programming as well as the positive role that they can play in encouraging inmate participation. In settings where officers do not support or undermine educational programming, professional development

activities should be undertaken to increase their understanding of the benefits of postsecondary programs and their role in student success. Officers might also be encouraged to attend postsecondary courses and invited to enroll for reduced or no cost.

Fostering Peer Support

Respondent comments and observations indicated that peer support for postsecondary program participation varied across sites. In some sites, students were engaged in discussion about course content and supported each other's learning, while in others students pursued their studies independently. Many study sites had only a small group of students participating in postsecondary programs and some were implementing these programs for the first time. As postsecondary programming becomes better institutionalized, students and facility staff should work to foster peer support structures. For example, in one site an inmate clerk helped to lead discussions about course lessons and, in another, students worked together to discuss a course assignment. Site coordinators, inmate clerks, and program participants might work together to better develop a culture in which students in postsecondary programs support one another.

Managing Challenges Created by Distance Learning Programs

While some students identified positive aspects of distance learning programs such as being able to learn on their own schedule and to view lectures multiple times, many expressed frustration with the distance learning approach. In particular, many students felt that the lack of regular interaction with the course instructor made it difficult to stay motivated and that the process of communicating with the instructor through the site coordinator was cumbersome and created challenges for getting feedback on their work and answers to questions about course content. Some students felt that course expectations were not clear and some had difficulty connecting the course content presented in lessons to information in textbooks. Several suggestions were made by respondents including receipt of more frequent and more substantial feedback from instructors; improved explanations about course format and expectations; provision of a tutor, such as an instructor from a local college; and use of an interactive television system or phone contact with the offsite instructor. Prison administrators who facilitate distance learning programs should monitor program delivery to ensure that student concerns are addressed. Ways to enhance communication between students and course

instructors should be explored so that students can effectively monitor their own progress and receive needed support and direction. In cases where there are challenges with the quality of communication between students and offsite instructors, administrators should explore options for creating local support structures for students, such as peer support groups and tutoring from local instructors or other volunteers.

Study Limitations and Next Steps for Research on Postsecondary Programs

The data presented in this article represent implementation of postsecondary programs in a large variety of prison settings; however, aspects of the study sample and design present some limitations to what can be concluded from findings. First, the sample of states and prisons was not selected to be representative of all state prisons and therefore limits the generalizability of findings. Sites that met the study selection criteria were those serving a high concentration of youth offenders who met criteria to participate in programs funded through the federal IYO grant program. Older students and those who used other sources of funding for participation are therefore underrepresented. Second, states and prisons that agreed to participate in the study may have characteristics that make them unique. For example, they may place more value on research evidence and have more interest in obtaining research evidence to support their postsecondary programming. Also, because the study provided a way to expand postsecondary programming in study sites, participating sites may represent those in which existing programming was weak or had limited availability—or those in which educational administrators valued postsecondary programs and saw the study as a low-cost way to expand them. Third, because the study was designed to examine the impact of the CEA/COA program using a random assignment design, findings from more than half of study sites represent the experiences of prisons in the first year of CEA/COA implementation. Therefore, many of the issues and challenges identified may be specific to this type of programming and, more specifically, to experiences in sites that are undertaking a new type of intervention.

Although several studies have generated promising findings related to the impact of postsecondary programs in prison, reviews of research in correctional education have identified several methodological issues that limit the strength of their conclusions (Gaes, 2008; Lewis, 2006; Tolbert, 2002; Winterfield et al, 2009). There is a need to conduct more rigorous studies of postsecondary correctional education programs to inform decisions related to policy and practice. Little is known, for example, about the impact of distance education

programs relative to those that feature direct instruction. It is also not clear what sort of student recruitment criteria, college preparation activities, and instructional supports are most effective for achieving program outcomes. To support strong design and implementation of these programs, future research must use rigorous research designs to relate these implementation components to measures of student success.

Notes

- ¹ As discussed, most postsecondary programs in prisons offer vocational, rather than academic programming. Consequently, most research has focused on vocational programs. Evidence is mixed about the relative benefits of each (Batiuk et al, 2005; Erisman & Contardo, 2005; Mathur, 2004).
- ² The study sample for the 2009-2010 academic year includes 43 prisons in seven states.
- ³ Subsequent analyses will compare baseline and follow-up outcomes for students in CEA/COA and control sites, including academic achievement; achievement motivation; educational aspirations; progress toward completing a postsecondary degree; and employability. Outcomes for institutions include: participation in postsecondary and other academic programming, institutional climate, and rates of recidivism.
- ⁴ Baseline and follow-up data collection in one state were conducted in February and August 2009, respectively.
- ⁵ Postsecondary academic programming was defined as academic coursework for which an inmate receives college credit that may be used toward a degree.
- ⁶ The Grants to States for Workplace and Community Transition Training for Incarcerated Youth Offenders (IYO) program was renamed to the Grants to States for Workplace and Community Transition Training for Incarcerated Individuals (Incarcerated Individuals) program in early 2009.
- ⁷ Students may have reported having neither a high school diploma nor an equivalency credential because they were in the process of completing certification requirements at the time of the baseline survey, they misrepresented their education level, or they were invited to participate in postsecondary programming without having met the requirements for eligibility.
- ⁸ Subsequent analyses will explore post-test achievement outcomes for students in CEA/COA and control site programming. Achievement scores will also be used to examine differences in outcomes that are associated with different program characteristics.

References

- ACT. (2010). *Collegiate Assessment of Academic Proficiency*. Iowa City, IA: Author. Retrieved March 22, 2010, from <http://www.act.org/caap/tests/thinking.html>.
- Adams, K., Bennett, K. J., Flanagan, T. J., Marquart, J. W., Cuvelier, S. J., Fritsch, E., Gerber, J., Longmire, D.R., & Burton, V. S., Jr. (1994). A large-scale multidimensional test of the effect of prison education programs on offenders' behavior. *The Prison Journal*, 74(4), 433-449.
- Bailey, T. (2009, Spring). Challenge and opportunity: Rethinking the role and function of developmental education in community college. *New Directions for Community Colleges*, 2009(145), 11-30. doi: 10.1002/cc.352.
- Batiuk, A. E., McKeever, M., & Wilcox, P. (2005). Disentangling the effects of correctional education: Are current policies misguided? An event history analysis. *Criminal Justice*, 1(5), 55-74.
- Bhatti, G. (2010). Learning behind bars: Education in prisons. *Teaching and Teacher Education*, 26(1), 31-36.
- Bazos, A., & Hausman, J. (2004). *Correctional education as a crime control program*. Los Angeles: University of California, Los Angeles, School of Public Policy and Social Research, Department of Policy Studies.
- Bloom, D. (2006). *Employment focused programs for ex-prisoners: What have we learned, what are we learning, and where should we go from here?* New York: National Poverty Center.
- Bureau of Labor Statistics. (2010). *Statistical Abstract of the United States*, 2010: Table 605: Employment Projections by Occupation: 2006 and 2016. U.S. Department of Labor. Washington, DC. Retrieved April 1, 2010, from <http://www.census.gov/compendia/statab/2010/tables/10s0605.pdf>.
- Carr-Chellman, A. A., Beabout, B., Almeida, L. C., & Gursoy, H. (2009). Idealized visions from behind prison bars: Prisoners' perspectives on school change. *International Journal of Educational Reform*, 18(2), 155-172.
- Case, P., & Fasenfest, D. (2004). Expectations for opportunities following prison education: A discussion of race and gender. *Journal of Correctional Education*, 55(1), 24-39.
- Chappell, C. A. (2004). Post-secondary correctional education and recidivism: A meta-analysis of research conducted 1990-1999. *Journal of Correctional Education*, 55(2), 148-169.
- Coley, R. J., & Barton, P. E. (2006). *Locked up and locked out: An educational perspective on the U.S. prison population*. Princeton, NJ: Educational Testing Service.
- Contardo, J., & Tolbert, M. (2008). *Prison postsecondary education: Bridging learning from incarceration to the community*. Paper presented at the Reentry Roundtable on Education, Washington, DC. Retrieved March 25, 2010, from the John Jay College of Criminal Justice website: http://www.jjay.cuny.edu/centersinstitutes/pri/pdfs/ContardoTolbert_Paper.pdf.
- Darling, B., & Price, T. (2004, March). Students' perspectives on alternative, community, and correctional education schools and services (ACCESS). *Journal of Correctional Education* 55(1), 1-9.

- Duguid, S., Hawkey, C., & Knights, W. (1998). Measuring the impact of post-secondary education in prison: A report from British Columbia. *Journal of Offender Rehabilitation*, 27(182), 87–106.
- Edwards-Willey, T. L., & Chivers, N. (2005). Perceptions of inmate-students' ability to succeed. *Journal of Correctional Education*, 56(1), 65–86.
- Erismann, W., & Contardo, J. B. (2005). *Learning to reduce recidivism: A 50-state analysis of postsecondary correctional education policy*. Washington, DC: The Institute for Higher Education Policy.
- Fine, M., Torre, M. E., Boudin, K., Bowen, I., Clark, J., Hylton, D., . . . Upegui, D. (2001, September). *Changing minds: The impact of college in a maximum security prison.: Effects on women in prison, the prison environment, reincarceration rates and post-release outcomes*. Retrieved March 25, 2010, from <http://web.gc.cuny.edu/che/changingminds.html>.
- Gaes, G. G. (2008, February 18). *The impact of prison education programs on post-release outcomes*. Paper presented at the Reentry Roundtable on Education, Washington, DC. Retrieved March 25, 2010, from the John Jay College of Criminal Justice website: <http://www.jjay.cuny.edu/centersinstitutes/pri/pdfs/GaesTheEffectivenessofPrisonEducationPrograms.pdf>.
- General Accounting Office (GAO). (1993). *Federal prisons. Inmate and staff views on education and work training programs* ([Report No. GAO/GGD 93-33] Report to the Chairman Select Committee on Narcotics Abuse and Control, House of Representatives). Washington, DC: Author.
- Hall, R. S., & Killackey, J. (2008). Correctional education from the perspective of the prisoner student. *Journal of Correctional Education*, 59(4), 301.
- Harlow, C. W. (2003, January). Education and correctional populations. *Bureau of Justice Statistics Special Report*, 1–11. Retrieved March 25, 2010, from Bureau of Justice Statistics website: <http://bjs.ojp.usdoj.gov/index.cfm?ty=pbdetail&iid=814>.
- Harrison, P., & Beck, A. J. (2006, May). Prison and jail inmates at midyear 2005. *Bureau of Justice Statistics Bulletin*, 1-13.
- Heiser, S. E. (2007). *Student perceptions of a college distance learning program at a maximum security prison* (Master's thesis). Available from Humboldt State University, Arcata, CA. Retrieved March 26, 2010, from <http://hdl.handle.net/2148/285>.
- Hughes, T., & Wilson, D. J. *Reentry trends in the United States: Inmates returning to the community after serving time in prison*. Washington, DC: U.S. Department of Justice, Office of Justice Programs, Bureau of Justice Statistics.
- Institute for Higher Education Policy. (1998). *Reaping the benefits: Defining the public and private value of going to college. The New Millennium Project on higher education costs, pricing, and productivity*. Washington, DC: Author.
- Jancic, M. (1998, December). Does correctional education have an effect on recidivism? *Journal of Correctional Education*, 49(4), 152–161.
- Klein, S., & Tolbert, M. (2004). *Common measures of performance: Using state data to assess the status of correctional education programs in the United States*. Washington, DC: U.S.

Department of Education Office of Safe Schools and Drug-Free Schools.

Langan, P. A., & Levin, D. J. (2002). *Recidivism of prisoners released in 1994*. Washington, DC: Bureau of Justice Statistics.

Lewis, J. (2006). Correctional education: Why it is only "promising." *Journal of Correctional Education*, 57(4), 286–296.

Lichtenberger, E. J., & Onyewu, N. (2005). *Virginia Department of Correctional Education's Incarcerated Youth Offender Program: A historical report*. Richmond: Department of Correctional Education.

Management & Training Corporation Institute. (2003). *Programs that help inmates stay out of prison: Growing public expectations*. Centerville, UT: Author.

Mathur, A. (with Reichle, J., Strawn, J., & Wiseley, C.). (2004, May). *From jobs to careers: How California community college credentials pay off for welfare participants*. Washington, DC: Center for Law and Social Policy.

Meyer, S. J. (2008). *College of the Air survey development and pilot test results*. Denver, CO: RMC Research Corporation.

Miles, M. B., & Huberman, A. M. (1994). *Qualitative data analysis: An expanded sourcebook* (2nd edition). Newbury Park, CA: Sage.

Moeller M., Day S. L., & Rivers, B. D. (2004). How is education perceived on the inside?: A preliminary study of adult males in a correctional setting. *Journal of Correctional Education*, 55(1) 40–59.

Mullins, I.V.S., Martin, M.O., & Foy, P. (2005). *IEA's TIMSS 2003 International report on achievement in the mathematics cognitive domains*. Chesnut Hill, MA: TIMSS & PIRLS International Study Center.

Nelson, S. D. (1995). *Learning their lesson: The impact on recidivism of providing college courses to inmates*. Paper presented at the Annual Conference of the Western and Pacific Association of Criminal Justice Educators, Reno, NV.

Pew Center on the States. (2008). *One in 100: Behind bars in America 2008*. Washington, DC: The Pew Charitable Trusts.

Solomon, A.L., Visher, C., LaVigne, N.G., & Osborne, J. (2006). *Understanding the challenges of prisoner reentry: Research findings from the Urban Institute's prisoner reentry portfolio*. Washington, DC: The Urban Institute, Justice Policy Center.

Spradling, T. (2000, August). Inmate perspectives on classroom technology. *Virginia Adult Education Research Network: Practitioner Research Briefs, 1999-2000 Report Series*, 3–5. (ERIC Document Reproduction Service No. ED445241)

Stephan, J. J. (2008, October). *Census of state and federal correctional facilities, 2005*. Washington, DC: Bureau of Justice Statistics, U.S. Department of Justice.

Steurer, S. J, Smith, L., & Tracy, A. (2001, September 30). *OCE/CEA three state recidivism study*. Elkridge, MD: Correctional Education Association.

Taylor, J. M. (1992). Post-secondary correctional education: An evaluation of effectiveness and efficiency. *Journal of Correctional Education*, 43(3), 132–141.

- Tewksbury, R., & Stengel, K. M. (2006). Assessing correctional education programs: The students' perspective. *Journal of Correctional Education*, 57(1), 13–25.
- Tewksbury, R., & Vannostrand, L-M. (1996, September 1). Environmental and interactional barriers to job satisfaction for postsecondary correctional educators. *Prison Journal*, 76(3), 275–292.
- Tolbert, M. (2002). *State correctional education programs state policy update*. Jessup, MD: ED Pubs. (ERIC Document Reproduction Service No. ED464230)
- Traverse, D. (2000, August). Correctional education: Instruction and student motivation. *Virginia Adult Education Research Network: Practitioner Research Briefs, 1999-2000 Report Series*, 3–5. (ERIC Document Reproduction Service No. ED445239)
- Travis, J., Solomon, A. L., & Waul, M. (2001). *From prison to home: The dimensions and consequences of prisoner reentry*. Washington, DC: The Urban Institute, Justice Policy Center.
- Walsh, S. M. (2000, March 16-18). *Why does a large prison population yield so few participants in a college program offered at prison sites?* Paper presented at the Annual Meeting of the National Council of Teachers of English, New York, NY.
- Walters, G. D. (2003). Changes in criminal thinking and identity in novice and experienced inmates. *Criminal Justice and Behavior*, 30(4), 399–421.
- Wilson, D. B., Gallagher, C. A. & MacKenzie, D. L. (2000). Meta-analysis of corrections-based education, vocation, and work programs for adult offenders. *Journal of Research in Crime and Delinquency*, 37(4), 347–368.
- Winterfield, L., Coggeshall, M., Burke-Storer, M., Correa, V., & Tidd, S. (2009, May). *The effects of postsecondary correctional education: Final report*. Washington, DC: The Urban Institute, Justice Policy Center.

Biographical Sketch

STEPHEN MEYER is a Senior Research Associate at RMC Research Corporation, 633 17th Street, Suite 2100, Denver, CO 80202; meyer@rmcdenver.com. His areas of specialization include educational research and evaluation, research design, and quantitative and qualitative data analysis. He is currently Principal Investigator for a national study of postsecondary academic programs in state prisons.

LINDA FREDERICKS is a Research Associate at RMC Research Corporation in Denver; fredericks@rmcdenver.com. Her areas of specialization include educational research and evaluation, project management, and qualitative data analysis. She is the qualitative analyst for a national study of postsecondary academic programs in state prisons.

CINDY BORDEN and **PENNY RICHARDSON** co-founded Northstar Correctional Education Services, 5023 W. 120th Ave. #321, Broomfield, CO 80020; northstar@ekit.com. Northstar provides services in evaluation, training, and staff development nationwide. They are former correctional education administrators experienced in the unique environment of prison schools and they are currently conducting the field work for the postsecondary study presented in this article.

Please address all correspondence to:

Stephen Meyer

RMC Research Corporation

633 17th Street, Suite 2100, Denver, CO 80202

303 825 3636

meyer@rmcdenver.com

This research was supported by the U.S. Department of Education, Institute of Education Sciences (IES), grant award number R305B070077. The views expressed are those of the authors and do not necessarily reflect those of IES.

Reproduced with permission of the copyright owner. Further reproduction prohibited without permission.