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The Association between Vocational Training Programs and Recidivism in a South Florida Prison

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Walden University

College of Education

This is to certify that the doctoral study by

Audrey Karlene Ives

has been found to be complete and satisfactory in all respects,

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the review committee have been made.

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Walden University

2022

Abstract

The Association Between Vocational Training Programs and Recidivism

in a South Florida Prison

by

Audrey Karlene Ives

MA, Walden University, 2018

BS, Trinity International University, 2001

Project Study submitted in Partial Fulfillment

of the Requirements for the Degree of

Doctor of Education

Walden University

August 2022

Abstract

To lower recidivism, a private rehabilitation and correctional facility (PRCF) in South Florida provides educational and therapeutic programs to inmates; however, the facility reported increased recidivism rates for several successive years. The purpose of this quantitative study was to examine the association between 12 vocational training programs at the local PRCF and recidivism. The study's theoretical framework was Hirschi's social bond theory of attachment, involvement, commitment, and belief. The research question sought to determine whether significant associations exist between specific vocational training programs and recidivism. A convenience sample of 187 inmates who completed one vocational training program and left the facility between January 1, 2012, and December 31, 2014, was used in the study. The chi-square test of independence was used to determine if there was an association between the independent variable (the 12 vocational training programs offered at the PRCF) and the dependent variable (recidivism). The chi-square result was not significant, $\chi^2(6) = 2.659, p = .850$. While there was no association between vocational training programs and recidivism, the literature is replete with examples where inmate participation in higher education and apprenticeship programs have reduced recidivism. These combined findings led to a policy recommendation to modify the PRCF's current vocational training programs to allow inmates to participate in higher education and apprenticeship programs. The study findings could promote positive social change by improving training and education to help reduce the adverse effects of recidivism and equip more inmates with the skills needed to reintegrate more successfully into society.

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Dedication

This study is dedicated to my mother, Gwendolyn A. Ives-Bowen; my first teacher, and a teacher to many.

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There are several people who I should acknowledge for their help, encouragement, and motivational efforts in completing this dissertation. Though you are too many to mention, I want you all to know that I recognize, appreciate, and thank you all. I would like to especially thank my doctoral committee:

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To my siblings, thank you all. I appreciate your contributions throughout this lonely journey. I love you all.

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Section 1: The Problem

The Local Problem

A local private rehabilitation and correctional facility (PRCF) in South Florida provides rehabilitation programs to approximately 2,000 inmates in their care. A PRCF refers to a for-profit business contracted by a government agency to house incarcerated people. The local PRCF's philosophy is entrenched in the belief that the key to reducing recidivism is associated with enrolling inmates in educational programs during incarceration and transitioning formerly incarcerated people to community-based programs upon their release; thus, each inmate is required to participate in educational and other treatment programs while incarcerated. The PRCF describes its commitment in the following statement:

We are committed to providing leading rehabilitation programs to individuals while in custody and post-release into the community through the [PRCF] Continuum of Care. [PRCF's] diversified services platform provides unique capabilities for the delivery of educational and vocational programs, cognitive behavioral and substance abuse treatment, and faith-based services across the entire corrections spectrum. (GEO Continuum of Care, 2020, para. 1)

The local PRCF produces annual publications that highlight the progress of the facility and publish the success stories of each released inmate. In addition, the facility continuously promotes its commitment to improving the lives of the inmates in their care by providing them enriched rehabilitation and post release services. The phenomenon of a continuously increasing rate of recidivism at the PRCF prompted this study.

The problem addressed in this study is that the local PRCF and State of Florida have access to quantitative data of inmate participation in the 12 vocational training programs offered at the PRCF and recidivism, but neither the PRCF nor the state have examined those data to see if the two variables are related. Without knowing if there is an association between the training programs and recidivism, funding may be misallocated on training programs that have no significant difference on recidivism. A report by the Florida Department of Corrections listed recidivism rates at 24.5% in 2014, 24.7% in 2015, and 25.45 % in 2016 (Florida Department of Corrections, 2020).

The local PRCF also published annual recidivism reports that showed annual increased rates in recidivism for the years 2012, 2013, and 2014 (GEO Continuum of Care, 2018). Based on these reports, it appears that inmates' participation in vocational training programs as a form of rehabilitation has not met the facility's desired goals of lowering recidivism. Although the PRCF maintains data on vocational training programs completed by the inmates and recidivism rates, according to the director of programs, to date, there has been no analysis to examine the association between vocational training programs and recidivism at the local PRCF.

Inherent to the facility's plan to lower recidivism, inmates are assigned to programs based on an initial assessment conducted upon inmates' entry to the facility, the results of which are used to identify risk factors for recidivism. The assessments aid facility administrators in understanding the behavioral and cognitive markers used to predict criminal behavior. The facility's rehabilitation responsibility process aims to pinpoint an inmate's criminogenic needs, which are needs that cause criminal behavior,

and meet those needs through programs that are designed with relevant end goals.

Responsivity is the term used to describe services to meet criminogenic needs.

Several factors influence recidivism. For example, lack of education, insufficient family ties, antisocial personalities, and criminal peers. (Kaplan & Nussio, 2018). Further complicating the goal of successful rehabilitation and reintegration into society are the inmates' varying views of education. Some inmates at the local PRCF, particularly those serving life sentences, have shown some hesitancy in participating in educational classes because they do not think the learning process will be beneficial to them.

Importantly, some scholars consider social bonds as a prominent factor in an inmate's successful return to society. According to Hirschi (1969), inmates who participate in vocational training programs that include social support may experience more positive outcomes when returning to society. Prior research has indicated that PRCF administrators find it paramount to engage inmates in setting goals for their educational and reentry success. This quantitative project study used secondary data to examine the association, if any, between vocational training programs and recidivism. The study focused on inmates who participated in one vocational training program and were released from the PRCF in the years of 2012, 2013, and 2014, and whether they recidivated within 5 years.

Rationale

Holmes and Waliczek (2019) suggested that prison administrators could adjust programs by identifying the behavior patterns that may trigger the inmate's likelihood to continue pursuing criminal activities; correcting such behaviors may lead to lower

recidivism. In addition, Viljoen and Cochrane (2018) reported that risk assessments can help mitigate the risk of violence and reoffending.

The purpose of this study was to explore the association between the 12 specific vocational training programs offered at the PRCF and recidivism. To date, neither the prison nor the state have used statistical methods to evaluate this relationship; therefore, a gap in practice was addressed through this study's quantitative approach.

Definition of Terms

Terms used in the field of corrections are often unknown; however, they are relevant in understanding recidivism. For this study, the definition of terms is based on how I used the terms in this study:

Criminal behavior: The term criminal behavior refers to an offender's conduct of committing unlawful actions (Martilik, 2018).

Desistance: Desistance refers to an individual's journey from offending to abstaining from criminal activities. Generally, desistance surrounds an individual's circumstances and what the individual believes is important (Jozan, 2020).

Interventions: Interventions refer to efforts to improve the well-being of a person (Vlaszof, 2017).

Need principle: The need principle refers to interventions that target inmates' criminogenic needs (Nelson & Vincent, 2018).

Recidivism: Recidivism refers to repeated criminal acts leading to rearrest, or reconviction, of a formerly incarcerated person within a 3- to 5-year period after their release from prison (Jozan, 2020).

Rehabilitate: Rehabilitate refers to reintegrating a person into society after imprisonment, through training, or therapy (Vlaszof, 2017).

Reincarceration: Reincarceration refers to a second or subsequent rearrest (Martilik, 2018).

Risk factors: Risk factors refer to the likelihood of an offender committing a crime again. Risk factors are addressed when the criminogenic needs of an offender are met (Martilik, 2018).

Risk principle: Risk principle means the level of treatment must match the offender's risk of recidivism (Nelson & Vincent, 2018).

Vocational training programs: Vocational training programs are programs that teach highly specialized educational training skills that prepare individuals for a specific field (Newton et al., 2018).

Significance of the Study

This project is significant because it provides evidence-based information on the association between vocational training programs and recidivism. I used Hirschi's (1969) social bond theory (SBT) to compare the various vocational training programs to each other with the intent of finding whether there is an association between vocational training programs and recidivism. The study addressed the gap in practice, which is that although the facility collects data annually, the data have not been analyzed to identify any association between vocational training programs and recidivism. The mission of the local PRCF is to have an annual reduction in recidivism by using the PRCF's data on recidivism and inmates' completion of vocational training programs to identify and

strategically target programs that show an association between vocational training programs and lower rates of recidivism.

The goal of this study was (a) to identify the distinct vocational training programs that lower recidivism and (b) to provide new insight that could lead the PRCF to eliminate ineffective vocational training programs, reinvest educational resources, and expand the vocational training programs that are effective in attaining the facility's goal of reducing recidivism. Moreover, Peled (2017) reported that U.S. prisons have the highest rates of recidivism worldwide. Therefore, this study could provide information nationally to the Department of Corrections, on a state level to prison administrators, and on a local level to inmates, employees, and stakeholders of the PRCF. The information gained from this study may facilitate a better understanding of the association between vocational training programs and recidivism.

Data on the association between vocational training programs and recidivism could lead to social change nationwide. For example, prison authorities may begin to reinvest resources into existing vocational training programs that can equip inmates with the technical skills, professional training, qualifications, and certifications they need to reenter society and not recidivate. Additionally, the nation could experience further social change when inmates, taxpayers, the Department of Corrections, and local prison administrators realize a reduction in the costs of housing prisoners. These costs were highlighted by the Council of Economic Advisors (2018), which reported that the United States spent over \$270,000,000,000 (1.4% of the U.S. gross domestic product) on funding criminal justice. These costs were amplified by rearrests, which were reported as more

than 50%. Also, providing relief to taxpayers by lowering the costs associated with incarceration would be beneficial to society. By identifying the most effective vocational training programs relating to lower recidivism, the National Bureau of Prisons (BOP) could enact prison reform toward vocational training programs, thereby identifying and publicizing nationally the best strategies for lowering recidivism.

Research Question and Hypotheses

A local PRCF aims to lower recidivism in South Florida by offering specific treatment programs to the inmates in their care. In this study, I examined the association, if any, between vocational training programs and recidivism within 5 years. In this study, recidivism was measured within 5 years of the inmate's release date among inmates who completed one of the 12 vocational training programs in the areas of culinary arts, horticulture, carpentry, welding, basic computer training, advanced computer training, barbering, commercial driver's license (CDL), hospitality and tourism, business education, wastewater management and environmental services. The research question and hypotheses that guided this study were as follows:

Research Question (RQ): What is the statistically significant association between completing a specific vocational training program, from the 12 offered at the PRCF, in culinary arts, horticulture, carpentry, welding, basic computer training, advanced computer training, barbering, CDL, hospitality and tourism, business education, wastewater management, and environmental services, and recidivism for inmates released from a local PRCF in South Florida in 2012, 2013, and 2014? Recidivism is based on returning to prison within 5 years of release.

H₀: There is no statistically significant association between completing a specific vocational training program, from the 12 offered at the PRCF, in culinary arts, horticulture, carpentry, welding, basic computer training, advanced computer training, barbering, CDL, hospitality and tourism, business education, wastewater management, and environmental services, and recidivism for inmates released from a local PRCF in South Florida in 2012, 2013, and 2014.

H₁: There is a statistically significant association between completing a specific vocational training program, from the 12 offered at the PRCF, in culinary arts, horticulture, carpentry, welding, basic computer training, advanced computer training, barbering, CDL, hospitality and tourism, business education, wastewater management, and environmental services and recidivism for inmates released from a local PRCF in South Florida in 2012, 2013, and 2014.

Review of the Literature

The purpose of this research was to bridge the gap in practice and contribute to the literature on the association between vocational training programs and recidivism. Generally, when a person thinks of prison, their thoughts surround criminals and punishment; however, at a local PRCF in South Florida, inmates' rehabilitation process is designed around educational programs. The PRCF's administrators believe in changing criminal behavior through academic and vocational education. Newton et al. (2018) conducted a study on the impact of vocational education on recidivism, and Duwe (2018) examined recidivism rates in relation to correctional education. However, although there are existing studies on prison education and recidivism, there is little to no research that

has used social bonds to examine the association between vocational training programs and recidivism.

Upon admittance to the PRCF, each inmate participates in an orientation that includes a risk assessment. This risk assessment documents each inmate's training interest and any educational disadvantages. Using the results of risk assessments to place inmates in appropriate vocational training programs may further aid in reducing recidivism. Research by Viljoen and Cochrane (2018) and Nelson and Vincent (2018) emphasized three principles for effective rehabilitation interventions:

- The risk principle: The level of treatment must match the offender's risk of recidivism.
- The need principle: The intervention must target the criminogenic need.
- The responsivity principle: The style of the intervention must match the offender's personality, learning style, and motivation.

For this study, the responsivity principle was the dominant factor of the three. According to a report by the United States Department of Justice Archives (n.d.), the BOP supports the philosophy that preparing inmates for successful reentry includes obtaining information regarding each inmate's risk of recidivating and programmatic needs, both of which inform the inmate's reentry plans. Programs that focus on inmates' needs that are linked to recidivism are generally successful (Ramsey, 2020); therefore, adhering to these rehabilitation principles ensures that inmates are placed in appropriate programs that meet the correct levels of intensity. Additionally, the risk principles and risk assessment provide prison authorities with information on inmates' educational

levels and future goals; these pieces of information are valuable resources to use when preparing inmates for successful reentry and lowering recidivism. Schweitzer et al. (2017) suggested that, during the intake process, prison authorities should use risk assessments to target programming decisions.

The BOP has developed programs similar to evidence-based programming; however, no evaluating pieces of research have been conducted on the BOP programs. The BOP's Directory of National Programs highlighted 18 programs as national models for prison education, yet only three of the 18 have ever been evaluated, and of those three, only one has been evaluated within the last 20 years (Byrne, 2019). The use of evidence-based practices is fundamental in reevaluating policies in the prison system. Therefore, when assigning inmates to treatment programs aimed at lowering recidivism—in this case, vocational training programs—prison administrators may need to rethink the centrality of risk assessments and ensure that programs are aligned with the inmates' needs and a path to successful reentry. This study provides prison administrators with statistical analysis of any association between vocational training programs and recidivism.

As a form of rehabilitation, the PRCF offers academic programs beginning at the mandatory literacy level, progressing to Adult Basic Education, and ending at the General Education Development (GED). After completing the GED, inmates are qualified to participate in vocational training programs. Despite offering these educational programs, the continued increased rate in recidivism implies that vocational training programs may not influence inmates' desistance equally.

Theoretical Foundation

I used Hirschi's (1969) SBT to underpin the study's focus of understanding the association between vocational training programs and recidivism. In the quest to understand and explain criminal offending, Hirschi proposed the SBT as a way to explore the connection between strong relational bonds and the likelihood to deviate from socially acceptable norms that result in incarceration. Hirschi's SBT states that, from birth, everyone possesses a drive to behave in unkind, selfish, and aggressive ways that could lead to criminal behavior. Hirschi further suggested that people could control their natural urges by taking the time to question their actions. Hirschi reported that the answer to why people commit criminal acts lies in the belief that one's behavior is controlled through the bonds people develop with prosocial values, prosocial people, and prosocial institutions. Additionally, Hirschi stated that these bonds are interrelated and materialize from principles including (a) attachment (emotional bonds from relationships); (b) commitment, as measured by one's investment of time and effort to pursue goals (see Tibbetts & Hemmens, 2009); (c) involvement (the time spent in goal-direct productive activities); and (d) belief in conventional ideas and thoughts about society and its laws (see Tibbetts & Hemmens, 2009). Table 1 presents the characteristics and examples of SBT's four principles.

Table 1*Hirschi (1969) Social Bond Theory's Principles, Characteristics, and Examples*

Principles	Characteristics	Examples
Attachment: Hirschi (1969) explained the construct of attachment as the strength of bonds that exists in relationships with family, school, community, and peers. This circle of friends can prevent deviant behavior.	Studies have shown that that social isolation is associated with increased recidivism rates (Lee et al., 2021).	Inmates usually work in groups when participating in vocational training programs like culinary arts and barbering, allowing inmates to develop bonds of attachments to classmates, teachers, and members of their small groups. Students use their sense of touch, caring, reaching out to others, and sharing ideas to create attachment bonds and build relationships (Nickrand & Brock, 2017).
Commitment: The level of dedication invested in future goals, as reflected in an agreement or pledge to do something in the future (Hirschi, 1969).	Investing time in education for career development or to meet future goals lessens deviant behavior (Rather & Parray, 2018).	Completing vocational training programs like welding, environmental services, beginning, and advanced computer programs, hospitality and tourism, and business administration leads to inmates obtaining various state certifications and licenses. The process shows commitment to programs, and to change (Wickert & Risi, 2019).
Involvement: A person who is involved in conventional activities will have less time to participate in deviant behavior (Hirschi, 1969).	The more these norms are internalized, the more difficult it will be to deviate from them. Involvement is directly related to enhanced self-esteem and cultivating supportive relationships, factors that promote well-being (Oosterhoff et al., 2017).	Completing vocational training programs of horticulture and carpentry displays inmates' involvement in the training process and could lead to their involvement in the change process.
Belief: The more attached an individual is to people who believe in society's values, the more that individual will believe in the values of conventional society members of society, which leads to involvement and investment in conventional activities and are less likely to deviate from such activities (Hirschi, 1969).	Belief in whether an action is right or wrong plays a critical role in one's decision to offend (Bernasco et al., 2017).	Vocational training programs like wastewater management and commercial driver's license appears to fall under Hirschi's construct of belief. Inmates participating in these programs may transfer the construct of belief to believing in themselves and believing in the possibility to change their future.

Justification for the Selection of the Social Bond Theory

The study centered on incarcerated adults who participated in vocational training programs as part of their rehabilitation plan. The study also aligned with the PRCF's aims to reduce recidivism. Hirschi's (1969) SBT informed the RQ by providing a theoretical justification for exploring the association between the 12 vocational training programs as extensions of the theory's four principles and recidivism. SBT defines recidivism as socially deviant behavior (Hirschi, 1969).

Review of Broader Problem

Societal concerns surrounding recidivism have led to studies that aim to identify effective strategies to lower recidivism; many of those studies have linked recidivism success to inmates' education (Ellison et al., 2017; Fogarty & Giles, 2018). Although I aimed to examine the association between vocational training programs and recidivism, I focused on prisoners and the vocational training program they participated in. To show how each vocational training program may differ and how such differences may or may not encourage an inmate's return to a life of crime, I conducted an exhaustive review of peer-reviewed literature within the last 5 years using the Walden University Library database, including SAGE, ERIC, Education Source, Criminal Justice Source, Psychology Articles, and ProQuest Dissertations and Theses. I also used Google Scholar, the Florida Department of Corrections' and the local PRCF's website, the Florida Department of Adult Education, and Education Research Complete to locate information. Additionally, I used literature from journal articles using sites on the worldwide web. The following keywords were most often used to identify appropriate scholarly literature:

recidivism, rearrest, recidivate, desistance, vocational education, prison education, and vocational training programs. I arranged the literature in two major categories of recidivism and education.

Recidivism and Education

The National Institute of Justice defined recidivism as measuring criminal acts that lead to reconviction, rearrest, or return to prison with or without a new sentence within 3 years of an inmate's release (as cited in Cai et al., 2019). However, the local PRCF determines recidivism based on a formerly incarcerated person's return to prison within 5 years of their release date. According to the SBT, individuals with strong social attachment or emotional bonds to family, friends, and social institutions upon release are less likely to violate society's norms and recidivate. The theory suggests that individuals with such attachments are more likely to reinforce and conform to socially acceptable behaviors. Regarding inmates, the theory suggests that strong attachment bonds to the institution and instructors could help inmates conform to acceptable behaviors, which could lead to lowering recidivism.

Scholars have studied the relationship between vocational education and recidivism. For example, Mbatha et al. (2019) established the relationship between inmates successfully returning to society and learning strategies (e.g., skills acquired through vocational training programs). The authors' study findings revealed a direct association between the two variables. In addition, Mbatha et al. reported that using vocational education and training programs as an integral part of prisoner rehabilitation provided offenders the opportunity to reduce recidivism and increased the likelihood of

successful reintegration, thereby reducing the risk of reoffending. Additionally, Cai et al. (2019) posited that, to reduce recidivism, scholars must identify the type of programs, the number of hours, and the intensity of the programs that are effective in reducing recidivism.

Although prior study findings have suggested that attachments to family, friends, and peers aligned with participation in vocational training programs and may lower recidivism, researchers such as Jakobs (2019) and Jozan (2020) had conflicting findings. Jozan suggested that incarceration causes a deterioration in inmates' prosocial support, which increases the risk for recidivism. Relatedly, Jakobs compared recidivism rates of inmates who participated in educational programs to those who did not and concluded that the number of hours inmates participated in both academic and vocational programs negatively impacted recidivism. Such contrasts among scholars warrant further research on the association between vocational training programs and recidivism. In this study, I aimed only to examine the association between vocational training programs and recidivism.

Vocational Education

Vocational education is a form of education that prepares individuals with specific skills necessary for employment as tradespeople. The local PRCF offers 12 areas of vocational education: culinary arts, horticulture, hospitality and tourism, barbering, beginning and advanced computer, carpentry, welding, wastewater management, business entrepreneurship, CDL, and environmental services. To ensure inmates' success when

they reenter society, each program provides state certification to the inmates upon their completion.

Inmates whose family and friends provide emotional assistance, financial assistance, and social connections may develop coping strategies for negative circumstances. Therefore, Hirschi's (1969) SBT was the theory underpinning this study, which aimed to explore the association, if any, between vocational training programs coupled with social bonds and recidivism at a local PRCF. Hirschi suggested that people with strong social attachments are less likely to continue participating in criminal activities, at least not to the extent of individuals without similar attachments.

At the PRCF, attachment is evident in various forms. For example, inmates who participate in vocational training programs like culinary arts or horticulture—both of which are year-long and require group participation—may develop relationships or attachments with teachers and peers. Such attachments, in addition to family attachments, are important in the successful reentry process. Cochran (2020) suggested that visitations from family and friends with whom inmates have strong attachment had some effect in reducing recidivism. It appears that inmates who maintain positive attachments to family and peers during incarceration are less likely to recidivate upon their release.

Although the focus of this study was not employment, it is important to note that many studies have reported that employment is a major factor in determining if formerly incarcerated people return to prison or remain successfully in society. Relatedly, each vocational training program at the local PRCF is geared at training and certifying inmates for employment. Lacey et al. (2017) reported that the four highest areas of employment in

the United States for the years 2014 and 2015 were farming, construction, food preparation service, and cleaning. Notably, two of these training courses are offered by the PRCF. The following sections explain how the PRCF delivers each vocational training program and how each program aligns with Hirschi's (1969) SBT.

Culinary Arts

One main goal of the local PRCF is to change inmates' thinking patterns. The facility administrators believe that to change criminal behavior, inmates must first start thinking differently. In other words, inmates must begin thinking less about criminal actions and thinking more in line with societal norms. To encourage this form of thinking and to contribute to inmates' successful reentry, the PRCF includes various therapeutic resources in the culinary-arts program.

The culinary arts vocational training program offers a sequence of courses, aligned with the Florida Department of Education Standards, to prepare inmates to become food-service managers. Prasath and Copeland (2021) suggested that therapeutic programs that use expressive arts and creativity while being innovative present inmates with the opportunity to create or to design new things, or to think in new ways. During inmates' participation in culinary arts, bonds or attachments are formed through participation in social activities where inmates work together to gain knowledge, develop skills, and prepare dishes, highlighting nutritional differences and cultural awareness. These activities may help inmates gain insight into their behavior, master time management, learn how to manage stress, and improve communication skills. These factors may lead to enhanced self-esteem, a crucial factor in desistance. Based on these

studies, it appears an inmate graduating from the culinary arts program places themselves in a position to provide for themselves and their family. Moreover, this achievement, coupled with the self-control developed through social bonds and training, may be a positive contributor to the inmate's successful reentry into society.

In explaining the level of psychological affection, one has for a prosocial institution, Hirschi (1969) suggested that individuals who form attachments to their schools will exhibit greater levels of self-control. Hirschi's SBT relates to the activities emphasized in the culinary-arts program. Instructors at the PRCF who encourage bonding and sharing with peers allow inmates to connect with peers, develop bonds with their instructors, and gain an appreciation for the institution.

The importance of attachment in strengthening desistance is not new. According to Tibbetts and Hemmens (2009), attachment is the most important factor in SBT. For example, Brunton-Smith and McCarthy (2017) reported on the influence of family attachments that provide support and encourage social control to inmates. Brunton-Smith and McCarthy suggested that such attachment bonds may discourage further criminal activities. Additionally, Abeling-Judge (2021) explored the impact of social bonding on schools and concluded that school socialization facilitates positive changes with peers and institutions.

With SBT and the bond of attachment in mind, Hirschi (1969) examined the association between vocational training programs and recidivism. Hirschi emphasized group and peer activities as the pathway to criminal desistance. Hirschi referred to the attachment bond as the affection one has for family, friends, peers, instructors, and their

institutions, and suggested that an individual who develops strong bonds of attachment—which involves one’s connectedness and emotions—will be concerned about the opinions and expectations of the people they feel attached to. Thus, inmates with strong attachment bonds may not continue in criminal activities.

Horticulture

Aiming to lower recidivism, the local PRCF’s rehabilitation plan includes allowing inmates to participate in the vocational training program of horticulture, also referred to as garden management. The horticulture vocational training program aligns with the Florida Department of Education Standards, and the program’s curriculum is designed around the Department’s framework. Horticulture for the PRCF refers to the science and art of cultivating foods and ornamental plants, including annual and perennial plants, fruits and vegetables, landscaping, and decorative plants for the indoors.

Horticulture could fall between olericulture, home gardening, floriculture, the production of flowers, pomology, and field agriculture for food; however, success in any category requires sincere involvement. The inmates participating in the horticulture program are required to complete 900 hours of theoretical and practical work before graduating as nursery managers. Inmates involved in the horticulture program are also aware that upon their release, they may become involved in productive activities, such as employment, that could motivate them to conform to socially acceptable behaviors. Farrier et al. (2019) reported that participation in horticulture programs impacts inmates’ mental health and well-being, increases social interactions with staff and other inmates, and provides the skills, work experience, and qualifications necessary for employment.

Farrier et al.'s study findings revealed that inmates who participated in horticulture felt more confident in managing their daily lives, experienced increased social interactions, developed emotionally, changed their behavior patterns, improved personal well-being, and improved their relationships with others. If inmates are made aware of the value of the horticulture program to their well-being, their future financial goals, and the influence on the possibility of recidivism, they may be motivated to invest their time and become involved in a process that could lead to their success.

Similarly, Lee et al. (2021) studied prisoners who participated in horticulture therapy once per week; horticulture therapy included activities on depression, anger, self-esteem, and life satisfaction. Positive emotional changes were reported in all areas of observation, and Lee et al. also reported improvements in participants' psychological health. Farrier et al. (2019) also highlighted the benefits of inmates' participation in a horticulture program and suggested that such participation may lead to lower recidivism.

Hirschi's (1969) variable of involvement suggests a person involved in conventional activities would have less time to participate in deviant behavior. Further supporting this theory, Guo (2018) reported that one's level of involvement in social activities discourages delinquent behaviors. Relatedly, Núñez et al. (2019) stated that engagement and motivation to learn are interrelated and may be used interchangeably. Inmates involved in the process of completing the horticulture program may be motivated to identify resources to aid in their desistance.

Technology Support Services (Basic and Advanced Computer Classes)

As part of the plan for inmates' successful rehabilitation, the local PRCF provides vocational training programs in basic and advanced computer classes. The PRCF requires all inmates interested in pursuing computer training to provide a written request to administration. Inmates are then admitted to the program based on seating availability. The basic computer class covers Microsoft Programming, Microsoft Excel, desktop publishing, and Tally, which is related to accounting. Upon completion, inmates proceed to the advanced computer class where they learn web design, software and programming languages, cybersecurity, and hardware maintenance.

Incarcerated inmates are not usually allowed computer access due to security concerns in prisons. However, inmates at the PRCF participate in basic and advanced computer training as part of their rehabilitation process. Otherwise, there is no internet access for inmates who are not assigned to computer classes. The administrators and staff of the PRCF consider it important that before their release, inmates are provided opportunities to conduct online research for resources that prepare them for successful reentry.

Offender rehabilitation through computer training programs has led to inmates developing higher self-esteem, self-confidence, self-efficacy, personal fulfillment, and self-improvement (Croux et al., 2019). The technical support program appears to be beneficial in an inmates' personal growth and development. Research shows that preparing inmates for job readiness upon their release leads to better outcomes (Hamilton, 2019). Equally important is considering inmates' social position upon

reentering society. Although equipping inmates with the technical skills that allow them to connect to support services, jobs, and ongoing education appears essential in the rehabilitation process for successful reentry, studies show the technology field is plagued with crimes (Kadum et al., 2020). Formerly incarcerated people seeking employment in the technology field may be concerning to potential employees,

In aligning the computer classes with Hirschi's (1969) SBT of commitment, Hirschi suggested that commitment in social bonds refers to the rational component. If an inmate is sincerely committed to conformity, their actions will reflect such commitment. Inmates show their commitment to the program by completing the basic computer program and continuing through completion of the advanced computer program. Hirschi explained commitment as a person investing time and energy to achieve their goals and suggested that such a person has more to lose and will be less likely to recidivate. However, considering the sensitive nature of individuals personal information stored on the internet and the ongoing increase in computer crimes, employers may show some hesitancy in hiring formerly incarcerated people (Maimon & Louderback, 2019; Seigfried-Spellar et al., 2017). Further, Biholar (2017) reported that formerly incarcerated people may find it difficult to restart their lives because of the stigma and mistrust generally associated with being formerly incarcerated. This stigma, along with the increase in computer crimes, could add obstacles to the inmate's commitment to success in a world that offers minimal opportunities to the formerly incarcerated. Therefore, formerly incarcerated people returning to society may face barriers or experience difficulties in the field of technology. Though the field of technology may appear

lucrative, and inmates may show a commitment to the program, based on the studies on technology crimes, the field of technology may not be favorable in lowering recidivism.

Hospitality and Tourism

Inmates at the local PRCF who participate in hospitality and tourism as part of their rehabilitation acquire knowledge relating to the hospitality industry's services. This process includes knowledge in customer satisfaction and offering services to people, including tourists and locals, and building relationships with others. The program also covers training in cleaning and maintenance, front desk operations, theoretically working with food and drinks, and hotel management.

The hospitality and tourism program involves relating to people, an area where inmates have reported some reluctance. Jefferson and Schmidt (2019) described prison ethnography as hesitant, slow to unfold, and constrained. To overcome fears related to social interaction, inmates are encouraged by staff to show commitment to the goals of the program, develop good work ethics, and improve their social skills.

Hirschi's (1969) SBT emphasized (a) commitment to institutions and social norms, and (b) being committed to the involvement in social activities while believing that each commitment is equally relevant to growth. To support this theory, the facility administrators oversee "Rehabilitation Wednesdays," a weekly event unique to the hospitality and tourism program. To emphasize the importance of social skills and demonstrate commitment to the program, inmates who attend this event are encouraged to practice the social skills that are essential in the field of hospitality. Inmates also share information through discussing their reentry plans. As the inmates orally outline their

plans for reentry, they are chosen by instructors to participate in mock interviews for jobs in the hospitality industry and demonstrate their knowledge in the field. According to Yuan et al. (2018), when administrators allow employees (in this case, inmates) to discuss and even question the facility's norms, it is indicative of a culture that values learning. Additionally, Rather and Parray (2018) reported that commitment is the psychological attachment of one individual to another and is based on feelings of identification, loyalty, and affiliation. Rather and Parray (2018) further stated that the benefits that result from participation in an organization's programs or activities are likely to produce greater affective commitment toward the organization, and such commitment results in favorable attitudes toward the company. Instructors are aware that because of the openness required in communicating, demonstrating, acting out characters, and displaying social interactions, inmates may not be committed to completing the program.

Incorporating the social bond of commitment to the hospitality and tourism program may strengthen the inmates' commitment to desistance upon their release. Commitment to the program relates to Hirschi's (1969) SBT, which refers to commitment as the investment of time and or effort on future goals. Learning is effective when learners are motivated to develop new skills or to acquire a specific type of knowledge (Joshi, 2017). Motivated learners may then become practical in their learning approaches and express a desire to learn how the program would serve their current and future needs.

Business Entrepreneurship

Inmates who participate in vocational training programs at the local PRCF can study business education, a program that covers an array of courses on the principles of business and aims to encourage inmates to become business owners. Muduli and Raval (2018) reported that adult learners appreciate instructional courses that are well organized and clearly outline their goals. Adult learners also prefer educational courses that align with real-life situations. The business education courses include entrepreneurship, economics, business management, and business law; however, the greatest emphasis is placed on entrepreneurship because many inmates have expressed their desire to start a business upon their release. These inmates are usually encouraged by staff to believe in themselves and to believe that their goals can be accomplished. Through participating in educational courses, people learn to be independent, solve problems, and acquire the social skills needed to influence their social environment (de Mooij et al., 2020). Consequently, these individuals feel in control of their lives and experience less feelings of powerlessness.

As part of the rehabilitation process and in the effort to lower recidivism, inmates who participate in the vocational training program of business entrepreneurship are encouraged to become members of the Gavel Club. The club enhances the inmates' writing skills and public-speaking abilities. Participants of this program are required to write letters to community sponsors sharing their business ideas and why they believe in the process. If the community sponsors believe in the inmates' ideas, they will provide financial support to get the business started; this process aims to show inmates that the

facility, the local community, and society believe in their ability to change and become productive citizens. Generally, the facility staff believes these inmates display good leadership skills and are savvy decision-makers equipped with the skills to start their own business or accept roles in the business industry; therefore, staff offer inmates their full support.

Hirschi's (1969) SBT focuses on the connecting bonds between people and society and emphasizes that such bonds help individuals control their behaviors. Hirschi pointed out that individuals without strong elements of social bonding are more prone to deviant behaviors. According to Hirschi, the bond of commitment to social norms and institutions involves an individual's expectations and aspirations in attempting to achieve societal goals. Commitment is influenced by an individual's level of belief regarding the morality and validity of society's values and norms, and individuals who believe in these norms are least likely to deviate from them (Hirschi, 1969). The business education program exposes inmates to many areas of commitment by requiring inmates to develop their business plans, complete the writing and application process for funding, and orally present their plans to facility staff and community members. After presentation, inmates have the potential to be awarded full funding for their business. This process requires months of commitment and patience from each inmate, and each step could be a means of strengthening desistance.

Welding

At the local PRCF, inmates have the option to participate in the welding program. Welding is ranked as one of the top five paying jobs in construction and is therefore a

high-demand class for inmates. According to Macheke (2018), welding may be a way for inmates to support themselves. Macheke suggested that welding may be able to transform people's lives because welders can find gainful employment in construction, shipping, automotive, and several other industries. The lack of financial support for formerly incarcerated people has been a concern surrounding recidivism.

The PRCF's welding program aligns with the National Center for Construction Education and Research (NCCER). NCCER provides accreditation for the PRCF and certifications for inmates who complete the welding program. NCCER's accreditation ensures that professionals and students receive uniformed standards appropriate training (NCCER Support, n.d.). It appears the potential for employment and financial gains in welding may be a factor in inmates' participation in the program; however, working as a welder may also initiate several personal hazards.

Studies from the U.S. Bureau of Labor Statistics (2022)) have reported on the financial benefits of welding; however, Yadav and Agarwal (2020) suggested that welding was a health hazard to welders both in the short term and long term. The researchers reported negative effects of welding, such as respiratory irritations, pulmonary infections, and cancers (Yadav & Agarwal, 2020). Duong et al. (2020) further reported on robots automatically performing welding tasks and suggested that welders were becoming redundant. Inmates at the PRCF are educated on the benefits and drawbacks of the program and can freely make decisions on class participation. Welding may be one area for inmates to regain years of financial loss, but inmates should also consider the detrimental aspects of engaging in a welding career.

Knowing of the health hazards and financial benefits of working as welders, inmates appear committed to participating in and completing the welding program to prepare themselves for reentry into society. Many inmates at the local PRCF share their concerns about being able to provide for themselves and their families upon reentering society. It appears that inmates' concern for financial security may be enough for them to ignore the health risks associated with welding and commit to pursuing welding careers.

Hirschi's (1969) SBT highlights the bond of commitment as the level of dedication invested in one's goals. Hirschi reported that commitment is aligned to one's agreement or pledge to do something in the future; a person who has already invested energy and time in achieving goals based on socially acceptable norms has more to lose by participating in deviant behavior. In support of Hirschi's theory, Oleson and Costello (2019) reported commitment is the degree to which people have a "stake in conformity" (p. 11). Oleson and Costello suggested an individual who is attempting to acquire a reputation of virtue invests themselves, their time, and their energy to a specific line of work. When these individuals consider participating in deviant behavior, they also consider the risk of losing the investments they have made into acceptable behavior, based on society's norms. Adult learners are most interested in learning things that could better their quality of life. Inmates at the local PRCF who participate in welding may view the program as the way to becoming financially independent. Notably, financial independence is a crucial factor in criminal behavior.

Wastewater Management

One of the vocational training programs offered at a local PRCF as part of inmates' rehabilitation is wastewater management. This program's classroom activities last about 8 weeks; however, each inmate must complete 300 hours of practical learning. According to the State of Florida Department of Environmental Protection, individuals are required to have a high school diploma or General Education Development (GED) to be eligible to take the test for the State's license (Florida Department of Environmental Protection, n.d.-b). Inherent to the facility's aim in lowering recidivism, the PRCF provides academic classes where inmates who are interested in the wastewater management vocational training program can gain their GED, a prerequisite to the program's participation.

The state of Florida has over 7,000 lakes, over 4,000 miles of estuaries, and about 50,000 miles of rivers and streams, as well as many wetlands (Florida Department of Environmental Protection, n.d.-a). It is imperative to protect Florida's water quality to maintain quality of life and protect the aquatic ecosystem. Florida has six classes of water designated use; however, this study's section of wastewater management focused on the potable water, or drinking water supply, in South Florida.

To ensure understanding and to emphasize the importance of the wastewater management program, inmates are made aware that the Clean Water Act specifies that each U.S. state must classify its surface water according to the designated use (Borisova et al., 2021). The Clean Water Act further highlights several factors negatively affecting South Florida water systems; for example, wastewater pollution problems are generally

associated with population growth (Bernal, 2018). Relatedly, according to a report by the Florida Department of Corrections (2020), Florida's population has increased over the last 2 years. The report stated that between April 2018 and April 2019, the population increased by 368,021 people, and further increased between April 2019 and April 2020 by an additional 387,479 residents. The facility's staff believe that inmates who participate in the wastewater management program will be in high demand for job placements, be qualified for opportunities in the field, and coupled with their state certification, may be positioned as leaders in the field, thereby leading to lower recidivism.

Hirschi's (1969) social bond of belief examines how delinquency could occur because of the broken bonds between an individual and society and focuses on an individuals' belief in the validity of societal values and norms. The social bond of belief suggests that if an individual believes that something is important, they will conform to support their belief. Inmates participating in the wastewater management vocational training program are provided an opportunity to reconnect with societal bonds and reconsider their position on the validity of society's values and norms by working with representatives from the local water facility. During the program, inmates learn about available resources, participate in correcting various social problems, and gain new learning opportunities and practical skills associated with the water industry. This exposure and inmates' continued participation may indicate their belief in the Clean Water Act and social responsibility. Inmates gaining an appreciation of this new idea of belief in themselves, in society, and in the institution could contribute to social change for

the community, thus discouraging criminal behavior and encouraging desistance in inmates.

Carpentry

The facility also offers inmates the opportunity to gain state certification in carpentry as a way to lower recidivism. Like the facility's welding program, the NCCER also provides the program curriculum and certifications for the carpentry program. This vocational training carpentry program mainly focuses on residential or commercial buildings that use woodwork, and incorporates knowledge of home-improvement projects, cabinet making, basic home repairs, and constructing patios, decks, and kitchens. Inmates who participate in carpentry at the local PRCF are sometimes required to make building repairs, such as constructing and installing classroom necessities like bookshelves and cabinets.

Hassan and Usman (2020) reported on the trade of carpentry as a program that provides training and technical skills to individuals who are enterprising and self-reliant. Inmates who participate in constructing items for the staff are generally focused, driven, ambitious, and desire to be successful in their assigned tasks (Director of Programs, personal communication, November 14, 2018). These traits support Hirschi's (1969) theory that the more involved inmates are in productive activities, the less likely they are to be involved in deviant behavior. Several scholars have conducted studies on Hirschi's SBT with the focus of involvement and delinquency. For example, Case (2017) studied inmates' involvement in leadership and positive development programs and discovered that individuals involved in such programs were better equipped to navigate adverse

social conditions, showed a decrease in deviant behavior, and showed increased prosocial behaviors. Additionally, Millenky and Hossain (2019) reported that involvement in educational activities could serve as a protective barrier against future justice-system involvement. Based on these studies, it appears that individuals who are involved in prosocial behaviors are less likely to participate in criminal activities.

Inmates at the local PRCF face many daily challenges, such as family separation, divorce, health issues, legal issues, facility lockdowns, financial concerns, and even dietary concerns. Inmates also display high levels of depression, elevated stress, and high anxiety levels based on fear of lockdowns, the uncertainty of what their future holds, and financial insecurity (Király et al., 2020). Kiraly's study further suggested that maintaining relationships and participating in social activities may alleviate some negative effects. Participating in vocational training programs like carpentry requires inmates' involvement with instructors, peers, and class activities. A study from Charles Koch Institute (2018) reported on reentry programs and suggested that a successful reentry program helps inmates overcome barriers and provides information on community resources that align with vocational programs. Some inmates have stated that being deeply involved, or remaining busy, in the vocational training program of carpentry has helped them to cope with the daily difficulties they encounter and keep them focused on their goals of successful reentry.

Environmental Services

All vocational training programs at the PRCF share a similar goal: to provide inmates with relevant, employable skills that will equip them for their successful return to

society and being able to support themselves. This goal aligns with the facility's effort toward lowering recidivism. Before gaining their certifications in the vocational training program of environmental services, inmates at the local PRCF must show mastery of knowledge in the requirements of the Occupational Safety and Health Administration's (OSHA) infectious waste regulations. OSHA (2017) states that all workers have the right to safe and healthy working conditions. Further, OSHA provides resources and comprehensive information for staff and employer training (OSHA, 2017). Areas of training required to earn a Certificate of Completion include knowledge in the safe use of chemical disinfectants, disinfecting contaminated surfaces, responding to infectious materials incidents, categories of infectious waste, selecting proper personal protective equipment, spill-response procedures, and the occupational hazards associated with handling infectious. Wali et al. (2019) reported on prisons' high frequency of infectious diseases and stated that for prison administrators to control the transmission of infectious diseases among inmates and staff, immediate preventative steps should be taken to improve prison conditions.

Inmates participating in the environmental services vocational training program are relied upon by the facility's administrators to ensure proper sanitation of the facility. The local PRCF does not have hand-washing stations for inmates or staff, and inmates' isolation rooms are minimal. Additionally, most cleaning supplies are not readily available. However, inmates gain practical skills by working with staff to carry out daily tasks relevant to the program.

The value of the environmental services program at the local PRCF was highlighted during the coronavirus pandemic (Michaels & Wagner, 2020). Legally, U.S. employers are expected to maintain workplaces free from serious hazards. The participants of the environmental services program displayed their commitment to the institutions and staff by working daily to ensure the facility was free from hazards. Program participants showed their commitment, a construct of Hirschi's (1969) SBT, to the facility, their peers, and facility employees by displaying their knowledge and competencies in their daily work assignments. Inmates met and exceeded their performance expectations and appeared to view each challenge as an opportunity to respond positively to the facility's needs. The uncertain nature of the pandemic required swift, efficient, and continuous actions from the environmental services inmates, and these inmates were intentional and systematic about improving the conditions at the facility and contributing to positive health outcomes. Based on inmates' dedication to the program, good work ethic, and commitment to duty, the facility—which houses approximately 2,000 inmates—reported minimal positive tests among the inmate population.

Because of their challenging work in maintaining cleanliness, working extended hours, and ensuring health standards were met within the facility during the pandemic, inmates in the vocational education program of environmental services strengthened relationships with their peers and gained new respect and recognition from staff and facility administrators. Deffendoll (2018) reported that staffs' rapport with inmates positively correlated with a commitment to the BOP strategy to utilize surveys to gain

information to examine how correctional facilities were adapting in preventing the spread of COVID-19, and to monitor the changes implemented during the pandemic. During the pandemic, inmates became aware of their value to the facility and appeared to develop a sense of pride in themselves. Furthermore, while performing their daily sanitation activities, inmates exuded more dedication and commitment to living up to the social expectation of the PRCF.

Hirschi's (1969) SBT suggests that society should apply the force of social bonds to constrain criminal behavior. Hirschi explained the bond of commitment as the idea of a person investing time to acquire an exemplary reputation and suggested that individuals considering participating in deviant behaviors also consider the cost of such behavior. Hirschi suggested that such individuals may not be willing to lose the investment they have made into building relationships and may therefore abstain from further criminal activities.

Barbering

To lower recidivism, prison administrators at a local PRCF have realized the centrality of identifying avenues for ex-prisoners to be successful when they reenter society. One such avenue is offering vocational training programs such as barbering. Inmates at the local PRCF can choose to participate in the barbering vocational training program for 1 year before gaining a state certificate as a certified barber.

Inmates participating in the barbering program are required to complete skills in hairstyling, cutting, coloring, clipper cutting, shaving, and mustache and beard trims. Inmates are also trained in skills such as effective communication, grooming, and

barbershop management. The program is funded by the Inmate Welfare Trust Fund, a fund held in trust by the Department of Corrections and used for the benefit and welfare of inmates in correctional facilities. Urombo and Kasimba (2018) reported that donor partnerships in rehabilitation programs were established to increase and enhance programs' quality and effectiveness.

During the program, instructors utilize the skills and knowledge of students who were barbers before incarceration to train new students. This form of peer tutoring helps inmates develop relationships and build trust and encourages students' involvement in the vocational training program. It appears that barbering programs may be a place where bonds of attachment are developed.

Barbering and barbershops have served as places for socialization where people meet to talk openly and honestly about their concerns and their communities, and where long-lasting relationships are formed. Ha et al. (2018) suggested that medical students should aim to improve men's health using barbershops because of the trusting relationships that are developed between barbers and clients. Furthermore, Urombo and Kasimba (2018) reported that prisoners who worked with tools and equipment were less likely to reoffend than those who did not. Based on these studies, it appears that inmates who are involved in the barbering program may develop interpersonal and practical skills and form deep attachment bonds that could aid in their successful reentry.

Hirschi's (1969) SBT refers to the construct of attachment as the level of affection an individual has for others, such as parents and friends, and institutions, such as schools. Hirschi suggested that individuals who formed bonds with others or with institutions will

experience greater levels of self-control. Attachments to institutions are also linked to successful adjustments. Chouhy et al. (2020) reported on social support as a resource to change an individual's life. Chouhy et al. posited that social support promotes cognitive transformations that better promote desistance. Inmates at the local PRCF who participate in the barbering vocational training program are provided many opportunities to build relationship bonds through attachment to their instructors and peers. Based on the above studies, these attachment bonds may be central to an inmate's decision to not recidivate.

Commercial Driver's License

The CDL is a license that is required to operate heavy and large vehicles, or vehicles containing hazardous materials. To earn a CDL, inmates participating in this vocational training program are required to be 21 years of age, pass a vision test and general knowledge test, show mastery in several endorsements, and pass written tests on hazardous materials (HazMat), tankers, passenger vehicles, and air brakes. Passing these endorsement exams provides the state with some assurance that the drivers can safely operate a commercial vehicle. Inmates are then allowed to obtain a CDL permit. Inmates are required to wait 14 days after receiving their permits to schedule the road test. However, at the local PRCF, all road tests are conducted using driving simulators.

Hirschi's (1969) SBT argues that individuals will perpetuate deviant behavior when their bond to society is weakened or broken. Hirschi further suggested that people who do not care about the expectations of the law or those who feel bound by society's norms will freely deviate and engage in delinquent behaviors. Thus, it is crucial to encourage inmates to build strong relationships with instructors and to maintain strong

bonds with family members because these relationships promote more conventional beliefs in society's norms. According to Hirschi, bonds of belief are crucial to the inmate's successful reentry. Hirschi also suggested that inmates are more likely to reoffend if they do not believe their previous actions were wrong or that they committed a crime against society. The stronger the inmate's belief in the law, the less likely they will be to return to a life of crime.

Rehabilitation programs are usually designed to help inmates overcome barriers that lead to successful reentry; this aligns with the goals of the PRCF because successfully overcoming barriers could lead to a reduction in recidivism. Lewis (2017) suggested that inmates can successfully reintegrate into society if their self-identified needs are incorporated into society. Bunting et al. (2019) reported employment has a positive impact on inmates returning to society. Similarly, Fox et al. (2021) posited that a good job not only provides the means for basic survival, but also is a key element in rebuilding self-esteem, attachment to conventional lifestyle, and a sense of belonging in the community. Work organizes daily behavior and patterns of interaction and becomes an important source of informal social control for formerly incarcerated people. Relatedly, the U.S. Bureau of Labor Statistics (n.d.) reported that commercial drivers' median pay was approximately \$45,000 annually. An inmates' ability to support themselves may positively influence them not to recidivate.

Implications

Inmates' participation in vocational training programs is a key factor to consider in preparing inmates for successful reentry into society (Eddy & Burraston, 2018;

Jalongo, 2019). This study's RQ and hypotheses provide implications for a policy recommendation based on the research literature and problems reported at the local PRCF. The primary goal of this study was to (a) apply SBT to examine the association between vocational training programs and recidivism, and (b) share the study's findings and recommendations with the administrators of the local PRCF.

Scholars have written about how vocational education influences recidivism; however, based on the gap in practice at the research site, I found it necessary to understand which specific vocational training programs best predict inmates' successful reentry. Prior research findings indicate the importance of a position paper, and the findings of the present study may assist prison administrators in implementing changes in the facility's vocational training programs to emphasize specific programs that are most related to successful reentry. For example, it might be beneficial for prison administrators to expand the vocational training programs that show an association with lowering recidivism and terminate programs that show no association with lowering recidivism. Expanding the relevant vocational training programs that are inversely associated with recidivism will help equip inmates with the best skills, experience, and certifications before they return to society. The study findings may also be generalized to provide the Florida Department of Corrections and the BOP with information about which specific vocational training programs may lead to lowering recidivism in the state and nationwide.

Summary

Factors such as the lack of housing and lack of employment can lead to recidivism. The mission of a local PRCF in South Florida states that one valuable

contributing factor in lowering recidivism is providing inmates with training and certifications in employable skills via vocational training programs before inmates' reenter society. However, despite the PRCF's diverse strategies aimed at lowering recidivism, the facility reported increased recidivism rates for the years 2012, 2013, and 2014. These data indicate a need to examine any association between vocational training programs and recidivism. The results of this study may lead prison administrators to tailor the vocational training programs toward ensuring employment upon inmates' return to society because employment has been shown to be an effective means of lowering recidivism. Section 2 details the study's methodology, the research design and approach, the instruments and materials, the data collection and data analysis methods.

Section 2: The Methodology

The local PRCF collects data on vocational training programs completed and on inmates' recidivism, yet no researchers have examined the association between each vocational training program and recidivism. Thus, the purpose of this quantitative project study was to address this gap in practice. Although evidence has indicated that inmates' participation in educational programs positively influences recidivism, the process of understanding the association between vocational training programs and recidivism requires statistical analysis. Reintegration can be daunting for inmates; however, inmates who participate in educational programs have higher rates of successful integration (Duke, 2018; Urombo & Kasimba, 2018). In this study, I aimed to identify the association, if any, between each of the 12 vocational training programs offered at the facility and the facility's recidivism. The local setting was a private correctional facility in South Florida housing approximately 2,000 inmates who participated in one of the 12 educational programs. I used Hirschi's (1969) SBT as the study's theoretical foundation for this study because SBT is a prominent paradigm in criminology studies and provides a theoretical explanation of the PRCF's goal to reduce recidivism by successfully educating inmates. The study addressed the gap in practice by evaluating available data quantitatively to understand the association between successfully completing a vocational training program and the recidivism of formerly incarcerated persons.

Research Design and Approach

I conducted a quantitative study that used secondary data on completed vocational training programs. These secondary data were retrieved from the PRCF's secured server.

I also gathered additional data regarding recidivism reports from the Florida Department of Corrections. These data are archived in public records by the Florida Department of Corrections. The study's dependent variable, a categorical level of measurement, was whether inmates were rearrested within 5 years of their release dates. The independent variables were the 12 vocational training programs offered by the PRCF. I used cross tabulation to identify patterns and associations between the variables. The chi-square test was the bivariate method used to identify whether the variables were independent or related and to identify any significant differences between the variables. Chi-square tests are appropriate to discover if there are relationships or any association between two groups (Laerd Statistics, n.d.).

Research Design

For this quantitative study, a correlational research design was used to measure two variables within a population. The independent variable was comprised of the 12 vocational training programs offered at the PRCF, whereas the dependent variable was recidivism. The use of secondary data may lead to an improved understanding of the effectiveness of the facility's vocational program in terms of inmates' successful reentry. The study met the quantitative data requirement through implementing a quantitative methodology, utilizing a secondary quantitative data design, and including approximately 587 participants. This number was derived from the facility releasing approximately 350 inmates each year; from this group, approximately 60 inmates participated in one vocational training program each year of 2012, 2013, and 2014.

Research Design and Approach Justification

Although the PRCF collects annual data on recidivism and on the vocational training programs inmates have completed, PRCF administrators have not analyzed the association, if any, between vocational training programs and recidivism. This study's use of archival secondary data in a quantitative methodology design addressed a gap in practice by evaluating the association between vocational training programs and recidivism.

How the Research Design Derives from the Problem

This study focused on the association between vocational training programs completed by inmates and recidivism. The vocational training programs were designed to lower recidivism, but the local facility reported increased recidivism rates in the years 2017, 2018, and 2019. The continued increased recidivism rates provided me an opportunity to address the gap in practice, which is the need to evaluate and understand the association between vocational training programs and recidivism. I used archived quantitative assessment data to study the association between the vocational training programs offered at the local PRCF and the facility's recidivism rates for inmates released in 2012, 2013, and 2014. Recidivism was determined by whether the formerly incarcerated individual was rearrested within 5 years of their release (i.e., beginning January 1, 2017, to December 31, 2019, respectively).

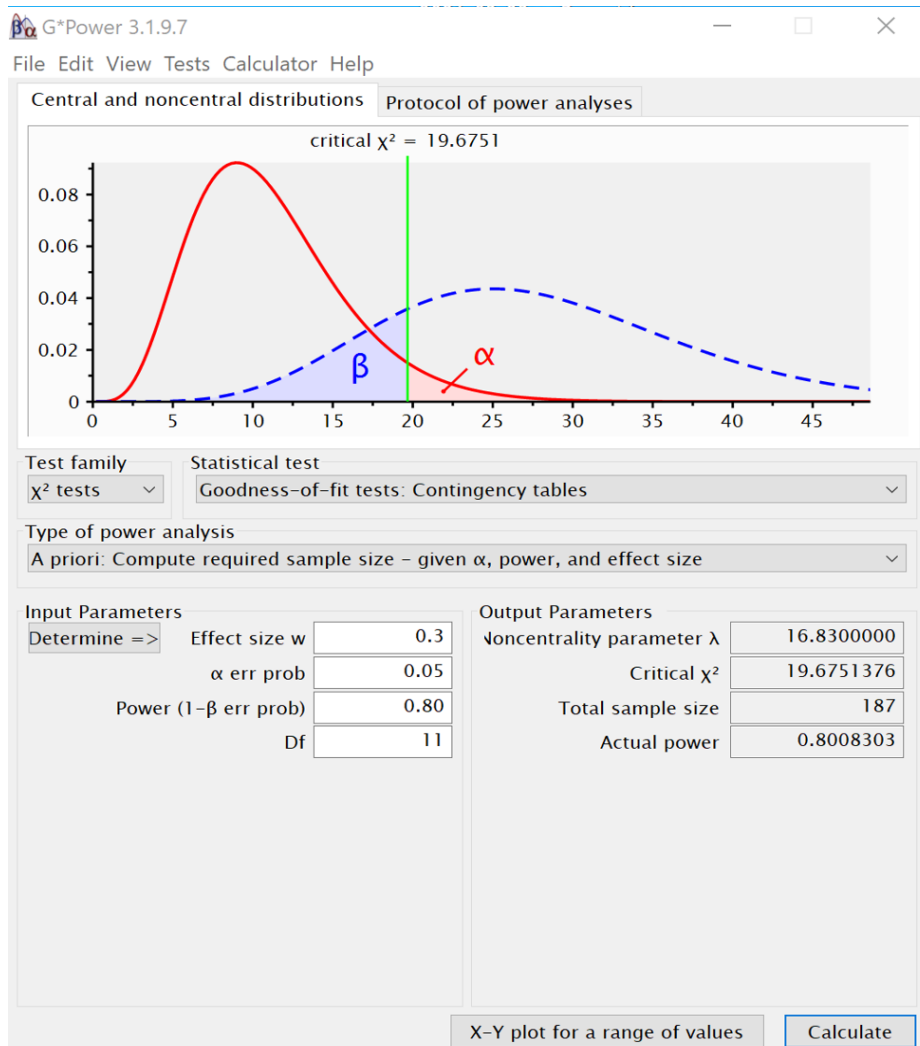
Setting and Population

The study participants were inmates released from a private correctional facility in South Florida. Based on approximately 350 inmates returning to society each year, I

examined data from approximately 1,000 inmates who left the PRCF between January 1, 2012, and December 31, 2014, and explored whether they were rearrested within 5 years.

Sampling Strategy

To obtain an approximate sample size for this study, I used the G*Power calculator to calculate and report the sample size based on an approximate number of 1,000 participants who were released between January 1, 2012, and December 31, 2014 (see Figure 1). Of the 1,000 inmates, approximately 1 in every 6 inmates took one vocational training course. To compute the sample size given alpha is .05, medium effect size (.3), and power of .8 given degrees of freedom $(2-1)$, $*(12-1) = 11$ was 187. Thus, the required sample size for this study was 187 participants.

Figure 1*G*Power Calculator*

The study used (a) secondary data on inmates who completed one vocational training program; (b) secondary data from the Florida Department of Corrections' inmate release reports, which identified inmates released between January 1, 2012, and December 31, 2014; and (c) the PRCF's recidivism reports for the years 2017, 2018, and 2019, respectively. Recidivism was based on inmates returning to prison 5 years after

their release. The facility's director of education provided data on the facility's inmate completions report to identify all inmates who completed one of the 12 vocational training programs. These data were codified to guarantee inmates' anonymity, and the data for each participant was provided in an Excel file. The study excluded inmates who participated in multiple vocational training programs.

Population Size

The local PRCF has a diverse male population that differs in age and ethnicity. However, this study focused only on the inmates who participated in one vocational training program between January 1, 2012, and December 31, 2014. and recidivated, or not, in the years 2017, 2018, and 2019, respectively. Recidivism was measured within 5 years of an inmate's release date.

Participant Eligibility Criteria

This study used archival data provided from individuals who were housed at the local PRCF, completed one vocational training program, and were then released from prison. Data collection was delimited to inmates who served time between January 1, 2012, and December 31, 2014. From this list, any who were reincarcerated between the years 2017 and 2019 comprised the recidivated group. These years were chosen due to Jozan's (2020) definition of recidivism as occurring within 5 years of an inmates' date of release.

Recruitment of Participants

No participants were recruited for this study. Rather, secondary data were used in this study.

Instrumentation and Materials

The study used secondary archival data from completed vocational training programs from the years 2012, 2013, and 2014, as well as archival data on inmates' recidivism for the years 2017, 2018, and 2019 from the Florida Department of Corrections. I collected data from both organizations, and the data was analyzed based on the research topic.

Concept Measured by the Instrument

Lowering recidivism is a goal of the PRCF. The PRCF utilizes educational, behavioral, substance abuse, and faith-based programs to meet its goals. Formal education reduces recidivism (Magee, 2021), and providing education to prisoners could lead to developing individuals with strong morals, which is beneficial to society (Ndunagu et al., 2020). Combining vocational training programs with Hirschi's (1969) SBT may provide more evidence-based information on effective strategies to lower recidivism. In this study, the dependent variable reflected two levels: (a) recidivism = yes or (b) recidivism = no. The appropriate result of the dependent variable was applied to each of the 12 vocational training programs offered at the PRCF. This created a 2 by 12 matrix.

Calculation of Scores and Their Meanings

The secondary data of vocational training programs completed were provided by the PRCF's director of education. The data are stored on the PRCF's secured server and are generally retained for at least 50 years.

Data Required for the RQ

Upon gaining permission from the Florida Department of Corrections and the local PRCF to conduct the study, the secondary data consisting of the PRCF's records of inmates who completed one vocational training program and left the facility between January 1, 2012, and December 31, 2014, were collected by the facility's director of education. The data were paired with the data collected by the analyst from the Florida Department of Corrections regarding previously released inmates who returned to prison between January 1, 2017, and December 31, 2019. All data were stored on the PRCF's secure server.

Nature and Scale for Each Variable

The study used the categorical dependent variable of recidivism and the independent categorical variable of vocational training programs. I used the Pearson's chi-square test of independence to examine if there were any associations between the variables. The chi-square tests each vocational training program and recidivism rate to determine if there was a relationship between the variables.

Data Analysis Plan

I used the chi-square test of independence to determine whether there was any significant association between the two categorical variables of vocational training programs and recidivism.

Assumptions, Limitations, Scope, and Delimitations

Assumptions

Vocational training programs with instructors who incorporate Hirschi's (1969) SBT may impact recidivism rates. Some assumptions concerning the study's methodology included the ease of accessing recidivism data from the private facility and whether the inmates in the study successfully completed each vocational training program.

Potential Weaknesses and Limitations

The study had weaknesses and limitations. Weaknesses included variances in the inmates' educational backgrounds that were not addressed in the study's assumptions. Inmates are required to obtain the required classroom hours to complete the program; however, to be eligible for state certification, students are required to earn a score of 5 on all areas of the Test for Adult Basic Education (TABE). (Florida Department of Education, 2020). Additionally, being in prison may cause inmates to devalue their education and fail to apply learning concepts. Other factors relating to weaknesses and limitations could influence recidivism, such as lack of housing, drug use, lack of family support, and unemployment.

Scope and Delimitations

Based on Walden University's criteria for project studies, the present study addressed a local problem. The study scope comprised of inmates who participated in one vocational training program during their stay at the facility. One delimitation was the varied educational backgrounds of the inmates. All inmates are required to participate in

educational programs; however, some inmates in the same vocational training programs may have college degrees, others may have a high school diploma, and others may have only an elementary education. Based on this, some inmates may be qualified to obtain their vocational certificate upon completing the class, whereas others may have difficulties completing the class.

Protection of Participants' Rights

The study used secondary data collected by the facility's director of education, and the data are stored electronically on the PRCF's secured server. Participants' personal information was kept confidential, and all participants remained anonymous based on the Institutional Review Boards (IRBs) and National Institutions of Health's Protecting Human Research Participants Training (2019) I completed several courses in research ethics to ensure the protection of inmates' rights and anonymity, including formal training on participants rights, and I continued to take training courses throughout the study. No inmates were contacted or interviewed for this study.

Data Analysis Results

The following sections provide the analysis of the study's data. This analysis aligned the problem, theoretical framework, RQ, and hypotheses.

The chi-square test of association was used to determine if there was any association between two nominal variables. According to Laerd Statistics (n.d.) to effectively conduct a chi-square test of association, the following four assumptions were considered:

1. The two variables should be either ordinal or nominal, both of which require categorical data. The variables generally take on values that are the names or labels.
2. All observations are independent. This means that the value of one observation in the data set has no effect of the value of any other observation.
3. The variables are mutually exclusive. This means that individuals can only belong to one cell in the chi-square table.
4. The expected value of cells should be greater than 5 in at least 80% of the cells.

This study readily met the first three assumptions; however, the fourth assumption was violated because three cells did not yield enough respondents to fulfill the requirements of the fourth assumption. Therefore, the courses environmental services, hospitality and tourism, and wastewater management collapsed and were added into the category of other. There were zero participants who attended the hospitality courses and therefore, that course was omitted from the chart. This data-combining decision led to the completion of the chi-square test without any violations, The frequency distribution of courses included in the study is provided in Figure 2. Figure 3 represents the cross tabulation for the number of inmates, who returned or not, based on the vocational training program the inmates participated in

Figure 2

Clustered Bar Count of Vocational Courses by Return or Not

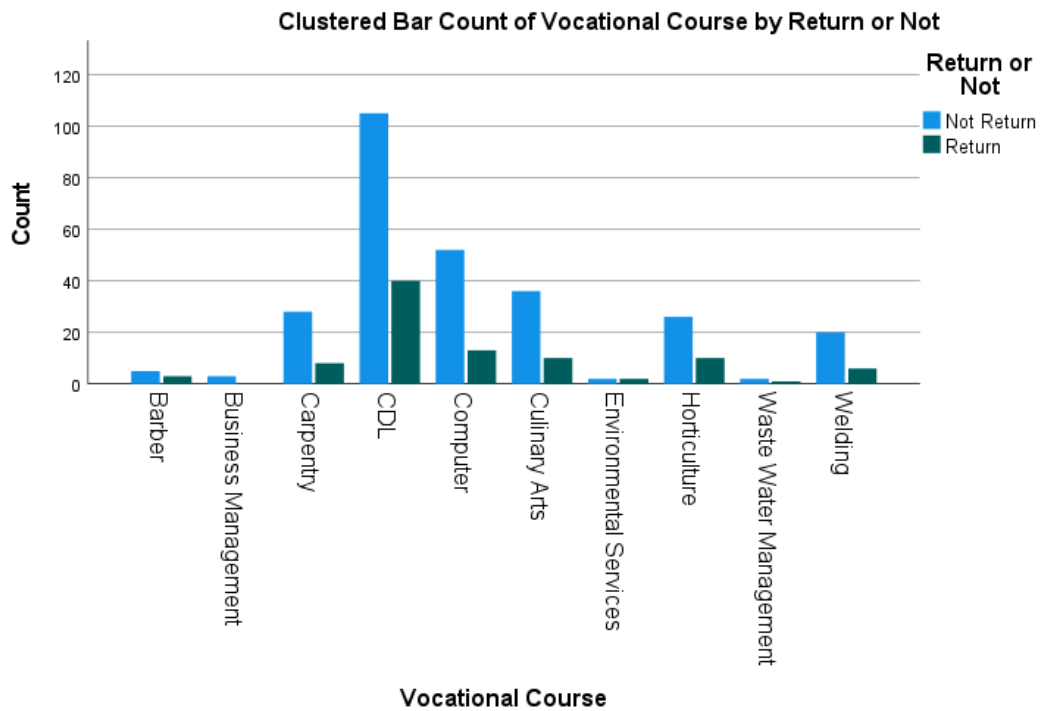


Figure 3*Cross Tabulation of Vocational Courses by Return of Not*

Return or not		Vocational courses											
		Barber	Business Management	Carpentry	CDL	Computer	Culinary Arts	Environmental Services	Horticulture	Wastewater Management	Welding	Total	
Not return	oth	3.00	0	0	28	0	0	0	0	0	0	0	28
		4.00	0	0	0	105	0	0	0	0	0	0	105
		5.00	0	0	0	0	52	0	0	0	0	0	52
		6.00	0	0	0	0	0	36	0	0	0	0	36
		7.00	5	3	0	0	0	0	2	0	2	0	12
		8.00	0	0	0	0	0	0	0	26	0	0	26
		10.00	0	0	0	0	0	0	0	0	0	20	20
		Total	5	3	28	105	52	36	2	26	2	20	279
Return	oth	3.00	0	0	8	0	0	0	0	0	0	0	8
		4.00	0	0	0	40	0	0	0	0	0	0	40
		5.00	0	0	0	0	13	0	0	0	0	0	13
		6.00	0	0	0	0	0	10	0	0	0	0	10
		7.00	3	0	0	0	0	0	2	0	1	0	6
		8.00	0	0	0	0	0	0	0	10	0	0	10
		10.00	0	0	0	0	0	0	0	0	0	6	6
		Total	3	0	8	40	13	10	2	10	1	6	93
Total	oth	3.00	0	0	36	0	0	0	0	0	0	0	36
		4.00	0	0	0	145	0	0	0	0	0	0	145
		5.00	0	0	0	0	65	0	0	0	0	0	65
		6.00	0	0	0	0	0	46	0	0	0	0	46
		7.00	8	3	0	0	0	0	0	0	3	0	18
		8.00	0	0	0	0	0	0	0	36	0	0	36
		10.00	0	0	0	0	0	0	0	0	0	26	26
		Total	8	3	36	145	65	46	4	36	3	26	372

For this study, statistical analyses included data obtained from the chi-square test of a total of 372 inmates who participated in one vocational training program and left the local PRCF between January 1, 2012, and December 31, 2014. Of the 372 inmates included in the study, 279 did not return to a correctional facility prior to 2020 while 93 recidivated.

A chi-square test of association was conducted between vocational training programs and recidivism. After collapsing three cells, all expected cell frequencies were greater than five. The chi-square statistics were equal to 2.659, and the chi-square distribution was equal to 6 degrees of freedom. ($\chi^2(6) = 2.659, p = .850$). The p value of .850 was greater than .05 and therefore, the study result was not statistically significant. There was no statistically significant association between vocational training programs and recidivism. Therefore, I could not reject the null hypothesis nor accept the alternative hypothesis even though all assumptions were met.

Limitations of Research Findings

The study's research findings have limitations. The participants do not include the entire population of inmates because some inmates are transferred to other correctional facilities and may have completed the vocational training program at other facilities. Additionally, the study focused on one local correctional facility in South Florida, and therefore the results were not generalized to include other local correctional facilities. Also, because only one correctional facility was examined, it is possible that released inmates that were counted as not recidivated in this study could have recidivated to a

different correctional facility outside the state of Florida. If this were the case, it would have adversely impacted the significance statistics reported in this section.

Summary

The data analysis revealed no statistically significant association between the vocational training programs offered at the local PRCF and recidivism. Therefore, institutional changes are required to achieve the facility's goal to lower recidivism. To implement organizational changes at the local PRCF's requires evidence-based data that informs institutional policies leading to lower recidivism. In Section 3, the policy paper makes recommendations for higher education and apprenticeships to positively affect the required changes.

Section 3: The Project

Introduction

In this study, the problem I addressed was the phenomenon of increasing recidivism at a local PRCF. The local PRCF and the State of Florida have access to quantitative data of inmate participation in the 12 vocational training programs offered at the PRCF and recidivism; however, neither the PRCF nor the state have examined those data to see if the two variables are related. In this section, I provide the rationale for the selection of a policy paper and propose two policy recommendations to the PRCF's executive and administrative staff. I also address the institutional and societal implications. The project is a policy paper recommending that the PRCF staff form partnerships with colleges and businesses in the local community to enable inmates to participate in higher education and gain employment skills thereby preparing them for success in returning to society and lowering recidivism. The appendix includes the project study.

Project Description and Goals

Project Description

This policy paper includes an introductory description of the project and its goals, the rationale, the literature review, and the implementation process. Lastly, the appendix includes information on the project study, project description, and goals of the project. The policy paper leads with an executive summary consolidating the problem as well as the evidence that led to the recommendations. The policy recommendations are research based, current, and focus on ways to lower recidivism. The policy paper outlines the

problem, the gap in practice, and the need for a policy that prompted the study. The policy paper then addresses the study's methodology and data analysis. This analysis, with evidence-based literature and best practices, supported the policy recommendations. The policy paper closes with a suggested implementation plan, conclusion, and references.

Project Goals

The results of the RQ revealed that the 12 vocational training programs offered at the local PRCF were not statistically significantly associated with recidivism. Higher education is among the strategies research has shown to help reduce recidivism (Achebe, 2021) and will also likely improve the employment opportunities for inmates returning to society. This opportunity aligns with the PRCF's Core Values and Mission (GEO Continuum of Care, 2020).

The PRCF currently has policies in place that were developed to reduce recidivism; however, the PRCF continues to report annual increases in recidivism. Therefore, this policy paper contains two primary recommendations to communicate to the PRCF's executive and administrative staff. The recommendations are supported by evidence-based research that focuses on reducing recidivism.

First, I recommend that the PRCF upgrade their current certification levels from vocational certifications to degrees in higher education and develop apprenticeship programs with local businesses. Notably, these upgrades and programs could lead to lower recidivism. Maier (2018) reported that gaining an associate degree from a prison program reduces the recidivism hazard rate among former male inmates. Furthermore,

Maier suggested that if the correctional system's goal is to reduce recidivism, prison administrators should implement prison associate degree programs or expand preexisting programs. Maier's suggestions are currently being implemented in other states. For example, in North Carolina, the Weiser Justice Program partners with Guilford College and sends professors into prisons to teach college-level courses. Additionally, professors from Craven Community College in North Carolina partner with Craven Correctional Institution and offer college courses to inmates (Collins, 2021).

Second, the PRCF should also consider developing apprenticeship programs that will allow businesses to receive a free and increased work force and inmates to gain the needed skills and experience to help them remain in society when they return. People who have been impacted by the U.S. criminal system may face barriers to equal employment opportunities. Apprenticeship programs allow inmates to gain skills that they can utilize to remain in society once they are released (Mehta, 2022). These recommendations are based on current research that reports effective ways to reduce recidivism. Future research into inmates acquiring associates or bachelor's degrees may further demonstrate that participating in higher education lowers recidivism rates.

Rationale

A policy paper was selected because it can provide the PRCF with evidence-based information on reducing recidivism through higher education and apprenticeship programs. The evidence demonstrated in this research highlights the need for changes in policy to meet the PRCF's goal of reducing recidivism. Novak and Fagan, (2022) and Duwe (2018) analyzed (a) whether U.S. prison systems may improve educational and

employment outcomes for prisoners and (b) the extent that education and employment would reduce prison misconduct and recidivism. Duwe concluded that closing the educational and employment achievement gaps observed in the prison system may lead to better post prison employment outcomes.

The PRCF vocational programs have been in place at the local site for 20 years, and recidivism rates have continued to rise. Although employment was not the focus of this study, employment has been shown as an area that may reduce recidivism. The study data revealed no statistically significant association between the current vocational programs offered and recidivism rates for the PRCF. This finding indicates the momentous need to modify the PRCF's current policy; thus, I decided to deliver a policy recommendation paper. This policy recommendation paper can help to fill the gap by providing evidence-based recommendations for new policies shown to lower recidivism.

Review of the Literature

To incorporate the use of best practices in developing a policy paper, I focused on peer-reviewed literature relating to policy recommendations for higher education and apprenticeships for lowering recidivism. I used the following keywords in my search: *recidivism, higher education, institutional change, institutional policy, higher education policy recommendation, prison stakeholders, institutional stakeholders, policy recommendations for correctional facilities, policy papers, white papers, writing policy recommendations for higher education, creating institutional changes in correctional facilities, presenting policy recommendations to prison administrators, and presenting policy recommendations to stakeholders.*

I conducted literature searches using Google Scholar and the Walden University Library. Specifically, I used the following databases: Dissertations & Theses @ Walden University, Education Research Starters, Open Dissertations, ProQuest Central, ProQuest Dissertations & Theses Global, Elsevier, Taylor & Francis, Eric, and SAGE Journals. The literature was categorized into several themes: the evaluation of policy paper recommendations, how to make justifications for a policy recommendation paper, prison education contracts, the use of evidence in the development of policy papers, and the importance of communicating policy changes to stakeholders.

Justification of a Policy Recommendation Paper

I referenced my analysis of the study's quantitative data to inform the policy paper's recommendation. According to Parkhurst (2017) evidence matters for policymaking; the use of evidence avoids harm and helps in achieving the goals of social policies. Additionally, data tools can distinguish better from worse. Evidence-based decision making includes adopting practices that encourage data-scientific thinking (Engler, 2020). The PRCF's organizational structure is guided by the direction the company wants to move in; therefore, this policy paper highlights the necessary course of action toward meeting the facility's goals.

Gulson and Sellar (2019) reported that data-driven educational policies affect the most change. Moreover, a well-defined policy paper that embraces the PRCF's goals and values could encourage facility administrators and stakeholders to implement the required changes. Therefore, the aim of this policy paper is to inspire an administrative policy change to improve the recidivism rates for the local PRCF and encourage positive change

for all stakeholders, including the inmates. This policy paper used the data analysis from the study's findings to present data-driven results, as recommended by Helgetun and Menter (2020).

Policy Papers Provide Data-Driven Results

Data-driven technologies promise accuracy and objectivity in scientifically informed educational policy and governance (Williamson & Piattoeva, 2019). According to Rodolfa et al. (2020), the current criminal justice system is not equipped to improve outcomes of the incarcerated. Rodolfa et al. further suggested that the current criminal justice system is ineffective and needs to implement programs to improve outcomes. This data-driven, evidence-based policy paper acknowledges the importance of participants and encourages collaboration between all stakeholders. Stakeholders benefit from data-driven policies when these policies determine what needs to be measured and allow the data to be collected, analyzed, and shared. Additionally, data analysis must align with the findings of the study and communicate the necessary recommendations for policy improvements (Christensen et al., 2020). Relatedly, a report by Helgetun and Menter (2020) stated that policy papers should be comprised of research data that can be provided to all stakeholders. This information allows evaluation of previous policies and provides evidence-based data for future practices.

Policy Papers Communicate Best Practices

As the author of the policy paper included with this project study, I am familiar with and have observed the PRCF's policies and procedures, and I am familiar with the roles and responsibilities of all the stakeholders. In this policy paper, I deliver my

recommendation clearly and concisely using various mediums. All stakeholders referenced in this paper could help to implement the recommended changes in policy and could also ensure the availability of needed resources.

Generally, research-based policy papers provide stakeholders with best practices (Cheeseman et al., 2019). Policy papers should not be viewed as mere suggestions but as relevant recommendations to help businesses remain compliant and current and establish a culture based on ethics. The data should outline the desired changes and provide a starting point for comparison to other studies and policies as well as highlight commonalities and best practices (Kogan, 2018). The current study data may drive policy changes at the PRCF and indicate best practices that can be used when exploring ways to reduce recidivism.

Policy Papers Are Solution Focused

Herman (2018) suggested that one goal of a policy paper is to emphasize all relevant findings and lead readers to the recommended solutions. An effective policy paper should highlight recommended changes and lead to momentous changes within an institution. However, policy papers are not always sufficient to cause changes (Gorard et al., 2020) or review new evidence against what is already known and do not just look to obtain impact from single studies. Gorard et al. (2020) further stated that better research was needed and suggested that policymakers be required to use evidence-led programs from libraries that provide studies appropriate and relevant to the policy makers aims, thereby leading to warranted solutions.

Although data from policy papers are advantageous in making policy recommendations and pointing out best practices, some stakeholders may not be willing to move toward changes. According to Gorard et al. (2020), providing institutions with access to raw or simplified evidence does not usually result in action. Therefore, policy recommendations should be clear and concise, allowing readers of the policy to develop a clear understanding of the problem. Policy papers should also highlight how the policy recommendations could result in meeting the facility's goals; in this case, the policy paper focuses on the PRCF's goal of reducing recidivism.

The Use of Evidence in Development of Policy

Policy recommendations cannot succeed on their own merit; but rather, the success is dependent on the implementation process. As understanding of policy increases, so should the need for turning intentions into results (Hudson et al., 2019). Drafting a policy recommendation should include planning, governance, stakeholder engagement, risk, monitoring, review, and evaluation (Hudson et al., 2019). Changes in policy decisions should also follow rigorous and accurate uses of scientific evidence (Parkhurst, 2017), as evidence-based policy may motivate stakeholders to implement the recommended changes. According to Bojtor and Bozsó (2020) evidence-based policymaking is considered a component of good governance. However, if governance is concentrated and not dispersed, policy makers should engage executives with multiple layers of diverse evidence-based knowledge. Collaborative governance may create balance and could provide better outcomes for the policy recommendations.

Strategic collaboration that incorporates guiding reasoning tends to be met with less resistance.

Evidence Provides Essential Information

Evidence should furnish the foundational information that supports policy recommendations. Therefore, it is necessary to be informed of the status of the organization and its current policies, to evaluate the facility's performance, and to develop activities that lead to necessary improvements. Generally, company executives make their decisions based on evidence-based data (Bennett, 2019).

This policy paper addresses tools for the successful implementation of strategic policies that are aligned with the facility's goals. The policy paper includes data-based evidence that supports and enables policy recommendations to move forward, and such evidence may also be used to measure future progress of policy changes as reported by Hollands et al. (2019).

The Value of Stakeholder Communication

The stakeholder groups that may be affected by this policy paper are investors, corporate executives, administrative staff, and inmates. Falco et al. (2022) reported communication as an overarching function for the success of policy changes. Effective communication makes the recommendations more acceptable and is necessary to ensure involvement of stakeholders in the next steps relating to the policy changes. Furthermore, as recommended by Caputo et al. (2018), it is important to understand the group of stakeholders the policy will affect before persuading stakeholders to consider the policy recommendations.

The goal of this policy paper is to provide recommendations to lower the inmates' recidivism rates and to help them prepare for their return to society by earning a higher education degree by the end of their sentences or participate in apprenticeship programs to gain experience and skills needed for employment. Communicating the policy recommendations to the stakeholders should show an alignment with the PRCF's goals. Highlighting such alignment may cause stakeholders to be more receptive to the recommended changes.

Communicating With Stakeholders

de Villiers and Molinari (2021) reported that to ensure that recommendations conform to the guidelines, researchers must ensure that the recommendations are seen as legitimate and that stakeholders believe in the necessity of measures to be taken. Furthermore, guidelines must be clear, consistent, and credible, and communications should be supported by open access to the data that support the guidelines and recommendations. The approach to identifying barriers and solutions consists of a 2-step participatory process that includes listening carefully and systematically to stakeholders' points of view. (Van Bruggen, et al., 2022).

This policy paper will be most impactful to the stakeholders, such as the facility's executive staff, the administrative staff, the director of programs, and the inmates. Therefore, it is prudent to address the stakeholders effectively and emphasize the relevance of the recommended policy changes. Furthermore, the recommended changes must be delivered in a piquant manner so that the information is readily received by the stakeholders (Caputo et al., 2018).

Project Description

Policy Recommendation Paper

The PRCF's mission stated,

We are committed to providing leading rehabilitation programs to individuals while in custody and post-release into the community through the [PRCF] Continuum of Care. [PRCF's] diversified services platform provides unique capabilities for the delivery of educational and vocational programs, cognitive behavioral and substance abuse treatment, and faith-based services across the entire corrections spectrum. (GEO Continuum of Care, 2020, para. 1)

The effort to reduce recidivism is one area that the PRCF continuously attempts to impact through their mission. This policy paper aims to furnish support to the PRCF in accomplishing this goal through the following recommendations.

Recommendation #1: Develop Partnerships with Local Colleges

Davis, (2019) summarized previous knowledge about the educational attainments and deficits of the incarcerated and discussed the effectiveness of educational programs in helping to lower recidivism. Thus, the first recommendation is to enroll inmates in higher education vocational training programs and enable them to obtain an associates or bachelor's degree. If recidivism is a dominant desired outcome in the prison system, opportunities for higher education should be made available (Castro, 2018). Higher education in prison humanizes incarcerated students, as it fosters inmates' belief that their lives have value and meaning and that they are worthy of living among other productive,

social people (Evans, 2018). This belief may help ex-convicts remain in society as free citizens.

Several colleges across the United States currently partner with prisons to provide higher education to inmates. For instance, currently, Florida Atlantic University sends a professor to the PRCF once per week to teach Civics class to inmates. Expanding the current program to incorporate higher education degrees would not require any additional resources from the facility.

Recommendation #2: Develop Partnerships with Local Businesses

By forming partnerships with local businesses, The PRCF can offer inmates the opportunity to participate in apprenticeship programs that will ensure job security upon their release. Although this study did not refer to employment as a factor in reducing recidivism, being able to support oneself through employment is an important factor to consider when formulating plans to reduce recidivism. Apprenticeship programs can be developed through the Prison Rehabilitative Industries and Diversified Enterprises, Inc., otherwise known as Pride Enterprises. The mission of PRIDE is as follows:

PRIDE Enterprises is an inmate training company operating 37 work training programs located in 19 state correctional facilities in Florida. In addition to vocational work programs that teach job skills and successful job behaviors to inmate workers, PRIDE provides post-release transition services including job referrals and other basic support services that prepare and assist ex-offenders in their successful reintegration into society. (Office of Program Policy Analysis and Government Accountability, n.d., para. 1)

If inmates have no hope for a meaningful future, there will be no motivation for them to consider practicing positive behavior changes (Smith & Johnson, 2022).

Needed Resources and Existing Support

Currently, the PRCF has in place all the resources needed to implement the policy recommendations. The Director of Programs, the Assistant Facility Administrators, the educational staff, and the PRCF team of alumni realize the value of the policy recommendations based on the PRCF's goal to lower recidivism. Many instructors at the PRCF hold higher education degrees, therefore, additional staff will not be needed to implement the policy recommendations.

Additionally, the PRCF has the necessary technological systems in place to achieve the policy intended outcomes; therefore, the recommendations were acceptable to all stakeholders.

Potential Barriers and Barrier Solutions

Realistic and ambitious solutions are needed to overcome barriers and make effective transitions toward new policies (Van Bruggen et al., 2022). People become comfortable in their professional lives; therefore, change may not occur without some resistance. Mikulić et al. (2021) reported that the largest problem for management is employee's resistance to change. The PRCF's annual recidivism reports show continuously increased rates. Therefore, by showing an alignment between the recommended policies and the PRCF's goal of reducing recidivism stakeholders may be more likely to respond positively to the recommended changes. Knowledge of the

effectiveness of the policy recommendations may motivate stakeholders to buy into the policy changes.

Stakeholders may be more enthusiastic about the policy recommendations if they are provided enough time to understand the recommended changes. Understanding can be achieved through sharing information and timely discussions of the policy recommendations with stakeholders. If barriers arise, they should be viewed as opportunities to engage stakeholders in the change process. Koskimaa et al., (2021) found that the success of long-term environmental policy relies on strategic forces that operate from outside the institutions' immediate control. The recommendations for the implementation of the policy changes create a chance to involve other stakeholders in creating the vision for the final product (Garcés-Ayerbe et al., 2019). If stakeholders display their commitment and dedication to the project, the project could possibly generate more interest and be embraced by more people. In addition, any request for modifications can be viewed as an opportunity to improve stakeholders' involvement.

Implementation and Timetable

I will introduce the policy recommendations to the PRCF administrators which is headed by the Facility Administrator, Assistant Facility Administrators, and the Director of Programs. The PRCF has a dual-governance system where Facility Administrators share policy recommendations with the PRCF's executive staff. The committee will review the proposal and make suggestions for any necessary changes. If the recommendations are 90% accepted, the Facility Administrator will present the findings to the Director of Programs. Upon gaining consensus, the PRCF's Programs Director will

work directly with the facility administrators and a representative from a local college to begin enrolling the inmates into college programs within 3 months. A college semester generally lasts 3 months.

Relating to apprenticeship, the Director of Programs will be tasked with the responsibility of enrolling inmates in the PRIDE program. The process could take approximately three months depending on the contractual requirements from PRIDE and the policy obligations from the PRCF.

Roles and Responsibilities

Putting together a policy to lower recidivism is an arduous task. The degrees are provided through the local college; thus, the college, as a stakeholder, has a significant role to play in providing relevant classes to meet the goals of the project. Other stakeholders, such as the inmates, have a personal stake in participating in the class to meet and maintain program requirements, which could provide a greater level of success in their return to society. Local businesses also have an interest in developing future employees for high-demand careers. Therefore, all stakeholders should work collaboratively to ensure the success of the policy recommendation goals.

The Programs Director will work alongside the Facility Administrators and college staff to communicate the expected rigor of the local college and emphasize the work ethic expected of the inmates. Staff at the college's financial aid office will be responsible for obtaining financial aid for the inmates through the Second Chance Pell Grant Program. The second chance Pell Grant Experimental Sites Initiative, which allows inmates' participation in higher education at no personal cost, was launched by the

U.S. Department of Education in 2015. The Grant provides need-based Pell Grants to people in state and federal prisons. In the 2019–2020 financial aid year, Second Chance Pell programs were operating in 30 states. The Federal Bureau of Prisons reported enrolling more than 22,000 students over the first 4 years (Chesnut & Wachendorfer, 2021).

Additionally, the Director of Programs will be tasked with the responsibility of collaborating with PRIDE to implement procedures for inmates to participate in apprenticeship programs. When Florida’s legislation authorized the Prison Industry Enhancement Program, correctional institutions began providing prison inmates to work in for-profit industries. Workers were paid and part of their wages went toward crime restitution and prison costs (Company Histories.com, n.d.). In Florida, PRIDE operates 37 work training programs where inmates produce license plates, graphics and printing, dental and optical products, wood and metal products, janitorial services, retread tires, traffic paint, and heavy vehicle renovation (Office of Program Policy Analysis and Government Accountability, n.d.).

Project Evaluation Plan

The goal of the policy recommendations is to improve the recidivism rates for the local PRCF. The recommendations focus on reducing recidivism by recruiting inmates to participate in higher education and apprenticeship programs. The project evaluation may be viewed as successful upon inmates’ completion of 2- or 4-year degrees, at which time the results of policy recommendations can be evaluated. After the initial cohort completes the PRCF obligations, data will be evaluated every year. Specifically, bachelor and

associates degree obtainment will be evaluated and compared to the recidivism rates within this study.

The PRCF's recidivism rates can be analyzed based on the rates from this study. The goal is to lower recidivism to rates lower than the average of 25% shown in this study. Inmates who complete a higher education program and leave the PRCF could be tracked and the information on recidivism could inform the PRCF's administrative staff of the effectiveness of the higher education program. The key stakeholders, the administrative staff, and the Director of Programs will be evaluating the results of the policy change. The results will then be communicated to the PRCF's executive board.

Project Implications

Implications at the Local Level

The local PRCF's mission statement indicates a commitment to pursuing avenues leading to lower recidivism and promote positive social change in the local communities. This policy paper serves as another attempt to accomplish this task. All stakeholders will be beneficiaries of this policy. Some inmates are permitted to complete an associate or bachelor's degree at no cost to them, whereas other inmates will work in an apprenticeship program to gain the skills needed for employment.

The apprenticeship programs will focus on providing skilled employees to businesses in the community. Inmates who complete their degrees view their lives as more meaningful and experience more positive emotions and less negative ones; additionally, they are more satisfied with their finances, employment, and their neighborhoods (Nikolaev, 2018). Upon returning to society, these inmates can command

higher wages, enabling them to support themselves and their families. According to Davis and Linton (2021), if individuals successfully gain employment after they have served their prison sentences, these individuals are less likely to recidivate. Because the PRCF's goal is to lower recidivism, this policy will be beneficial to the prison administrators and executives. In the local communities' employees and families serve as role models to urban youth reinforcing values and expectations about social institutions that guide them away from crime (McDaniel, et al., 2021).

Implications in the Larger Context

The area that the PRCF serves has a 37% poverty rate compared to the 15% rate of Florida (U.S. Census Bureau, 2021). Research shows there is a direct correlation between higher education and higher earnings (Ma et al., 2019). Relatedly, lower levels of education equate to lower levels of unemployment, dependence on social welfare programs, and ultimately higher incarceration rates. Ma et al., (2019) reported that higher levels of education are aligned with more civic participation. Additionally, society benefits from an educated populace through the potential for higher tax revenues.

Summary

In Section 3, I outlined the appropriateness of a policy paper for this project study, which aims to create the sustainable change required to lower recidivism. The literature underpinned the study and provided insight into working with prison stakeholders. Because the policy recommendations align with the PRCF's goal to reduce recidivism and the facility currently has all the necessary resources in place, implementation of the recommended changes will be more acceptable to the stakeholders.

Section 4: Reflections and Conclusions

Project Strengths and Limitations

I am grateful to the PRCF and the Florida Department of Corrections for allowing me to use their data to complete this study. Both organizations contributed to completing this evidence-based study on the association between vocational training programs and recidivism. The data used for conducting the analysis was information on inmates who completed one vocational training program and left the facility between January 1, 2012, and December 31, 2014. This information was provided by the PRCF's director of programs. Additionally, the Florida Department of Corrections staff provided the data on recidivism for the years 2017, 2018, and 2019.

The study results showed no statistically significant association between the 12 vocational training programs offered at the facility and recidivism. Therefore, the result led to the need for recommendations for other avenues to lower recidivism, and a policy paper was developed. The policy paper addressed the gap in practice, conveyed the results of the study to the PRCF's staff, and outlined the best methodology to support the recommendations. Upon receiving support from the PRCF's administrators, and informing the stakeholders, the PRCF will have the resources to launch the new policies.

Project Strengths

This study was appropriate for addressing the gap in practice of implementing measures to reduce recidivism at the PRCF. The local problem of a continued increase in recidivism, along with the study results, supported the need for a policy paper. The policy paper described how higher education and apprenticeship programs could lead to

lowering recidivism. According to Hudson et al. (2019), understanding why things go wrong is a crucial step in finding solutions. This evidence-based study emphasized the need for organizational change to accomplish the PRCF's goal of lowering recidivism.

Because the PRCF currently partners with a local college that offers 2- and 4-year degrees, the recommendation for implementing college-level programs was well received. Additionally, the recommendation for an apprenticeship program was also well received because PRIDE Enterprises, the targeted company for apprenticeship, already operates in multiple correctional facilities in the local area and continuously reports success from working with inmates. PRIDE's programs are federally certified and encourage state and local governments to create employment opportunities for ex-prisoners (Reutter, 2005). The overarching support of the stakeholders was displayed and may influence other local facilities to implement similar strategies in lowering recidivism.

Project Limitations

This policy paper was developed specifically for the local PRCF. The PRCF currently has all the required resources in place to implement the recommended changes. However, other local facilities may not have the necessary resources to implement similar changes.

Recommendations for Alternative Approaches

To ensure best quality practices, a qualitative research study could have been used to gather input from all stakeholders, including the inmates. However, gathering information would require structured interviews with focus groups, and conducting

interviews with inmates could be problematic. Inmates are a protected group and are usually under constraints that affect their ability to make voluntary decisions about participating as research subjects. Additionally, the Institutional Review Board has safeguards in place to protect this vulnerable population, and Federal regulations stipulations must be met by researchers who interview inmates (NIH Grants & Funding 2019).

Additionally, I could have focused on professional development. When there is a need to improve outcomes, professional development is crucial (Sancar et al., 2021). The PRCF's instructors could have been trained to assist inmates in preparing for their college journey. Instructors could be trained strategically in areas of student motivation, assembling resources for college education, how to apply to colleges, and how to provide support for student's transition into higher education. However, this plan would place focus on teacher training, which is not a concern at the PRCF.

Scholarship, Project Development and Evaluation, and Leadership and Change

Scholarship

After several years of working as an educator in a local PRCF and witnessing inmates return to society and then return to the facility within a few years, I felt that my professional growth had begun to stagnate. I became aware of the need to understand why the inmates recidivate and felt the need to explore new avenues to lower recidivism. While completing a master's degree in Education from Walden University, many of the inmates I taught were aware of my returning to school and expressed their desire to participate in higher education. Some inmates had associates and bachelor's degrees

before they were incarcerated, and many expressed the belief that they may not have ended up in prison if they had continued their education. I then enrolled in Walden University's Doctor of Education program because it allowed me to become a leader, researcher, and practitioner in my focus area of programs to lower recidivism.

Walden allowed for weekly interactions with my peers and my professors, which encouraged me to think differently, question my contribution to the PRCF's goals, and most importantly, reflect on my contributions as an educator in preparing the inmates to return to society. Additionally, Walden's promise of creating social change motivated me to focus my study on an area that could have a vast influence of positive social change in the local community, the state of Florida, and the nation. Many businesses engage in positive social change to address societal issues, such as poverty and social injustice (Bailey & Lumpkin, 2021).

I recognized a shift in my professional deployment, which caused me to begin thinking differently. My educational experience at Walden has taught me how to conduct research, analyze situations, and explore and identify solutions to problems. I have grown as a scholar practitioner, developed leadership qualities, and will continuously strive for self-improvement. The results of my study contribution may lead to finding a solution to solve a local problem and solidify my commitment to lifelong learning in adult education.

Project Development and Evaluation

I have worked in the local correctional facility for the past 6 years, and I have witnessed positive changes in many inmates. This experience caused me to become aware that my outlook regarding opportunities for inmates, as they prepare to return to

society, could be biased. As I read numerous peer-reviewed literature studies on lowering recidivism, I endeavored to keep an open mind and to remain objective; this process allowed me to focus on the specificity of my study. The impetuous acknowledgement of the gap in practice helped to define my study. The results of my research led to a policy paper that outlines the foundation for social change beginning at the local level.

When the PRCF implements the policy recommendations and begins to lower recidivism rates, the process will confirm the project's success. Reviewing and gleaning evidence-based information from the literature revealed necessary strategies for effective policy changes to be sustained. For example, stakeholder buy-in is crucial (Hickey et al., 2018). The stakeholders at the PRCF were enthusiastic about the recommendations. However, collaboration between stakeholders will be essential for the policy's success (see Ngo et al., 2018). The stakeholder's enthusiasm inspired productive collaboration among the PRCF's staff.

Leadership and Change

Leadership qualities develop through a social process; although an individual may not bear the title of a leader, they may possess leadership qualities and could be the catalyst of positive changes. Leadership, and the degree that stakeholders facilitate the implementation of change, contributes to the success of organizational change (Sihite et al., 2020). These policy recommendations arose from an educator at the PRCF recognizing a problem, identifying solutions to the problem, and communicating the problem and recommended solutions to the stakeholders. The policy recommendations

are based on current research that addresses the problem of continuously high recidivism at the facility. Adhering to the recommendations can lead to relevant social change.

Reflection on the Importance of Work

To prepare inmates to return to society and not recidivate, the PRCF allows inmates to participate in 12 vocational training programs as a form of rehabilitation; however, recidivism rates continue to rise. The results of this study indicated that there was no statistically significant association between the 12 vocational training programs offered at the facility and recidivism. This study findings led to the development of a policy paper that suggests the PRCF partner with local colleges and enable the inmates to gain degrees in higher education before they return to society. Participating in degree programs appears to benefit inmates after they return to society. La Roi (2022) examined correctional education programs in a Wisconsin prison and reported that ex-inmates who received an associate degree in prison had a 25% recidivism rate compared to a 50% recidivism rate of ex-inmates without degrees. Similarly, Miller (2021) conducted a study on inmates in New England and found that providing postsecondary education to prisoners gave them back their humanity, thereby positively impacting the prisoners' self-concept. This factor may play an important role in recidivism.

The policy paper also recommended that the PRCF form partnerships with local businesses, such as PRIDE Enterprises, to allow inmates to participate in apprenticeship programs to better equip them to return to society. In exploring avenues to reduce recidivism, Mallion (2021) reported that the provision of specialized skills and trainings were effective resources for reducing the risk of reoffending. Additionally, Newton et al.

(2018) found that inmates who participated in post release employment programs reported better outcomes than inmates who did not. Local businesses can benefit from a readily available labor force and inmates can gain the skills and experience needed to be efficient employees upon their return to society.

Implications, Applications, and Directions for Future Research

Implications

This policy paper aimed to address the gap in literature and provides evidence-based data on strategies to lower recidivism. The Florida Department of Corrections (2022) published a quarterly report that indicated a continuous increase in recidivism between January 1, 2022, and March 31, 2022 (Quarterly Recidivism Report, 2022). The policy paper highlights avenues, such as utilizing benefits from the Pell Grant, to enable inmates to gain higher education degrees before they return to society. The policy paper also recommends allowing inmates to participate in apprenticeship programs before they are released into society. Previous studies have supported both recommendations as ways to lower recidivism (see La Roi, 2022; Newton et al., 2018; Rose & Shem-Tov, 2021).

Applications

The local PRCF currently partners with a local university to provide Civics education to the inmates. Several prisons across the United States currently participate in higher education programs for inmates. The Civics program at the local PRCF could be used to implement the first recommendation and allow inmates to participate in higher education programs. Additionally, PRIDE Enterprises currently operates through several local correctional facilities and is readily available to implement the second

recommendation. These recommendations can be shared with other correctional facilities in Florida and be used as a template for understanding and measuring recidivism.

Direction for Future Research

The PRCF currently hires some ex-inmates for clerical jobs at the corporate office through the Continuum of Care program. The local PRCF employs academic and vocational instructors, none of whom are ex-inmates. If inmates complete a 2-or 4-year degree or participate in apprenticeship programs and gain employment upon their release, these inmates could be hired to work with inmates who are incarcerated at the local PRCF. Because many inmates serve extended sentences, interacting with people who were once incarcerated with them and are now free citizens may provide motivation and hope for those currently incarcerated. Future research could focus on the effectiveness of employing ex-inmates to work in facilities they were once incarcerated. If predictors for success are identified, the policy paper can accommodate other recommendations.

Conclusions

The continued increase in recidivism rate for a local PRCF inspired this project study. Using the knowledge I gained from my Walden Doctoral study, along with the support of the doctoral committee and an exhaustive review of peer-reviewed literature, I conducted a scholarly, evidence-based, and data-driven research study that answered the RQ and provided recommendations for improvements in the facility's recidivism rates. This process has ignited a desire in me to explore new avenues to develop social change, beginning in my local community and expanding throughout the State of Florida, and the

entire United States. The study contributes to the body of scholarly literature and will be made available to other researchers.

References

- Abeling-Judge, D. (2021). Social opportunities of controls: Revisiting the desistance effects of employment. **Deviant Behavior**, **42*(9)*, 1177-1193.
<https://doi.org/10.1080/01639625.2020.1734169>
- Bailey, R. C., & Lumpkin, G. T. (2021). Enacting positive social change: A civic wealth creation stakeholder engagement framework. **Entrepreneurship Theory and Practice**. Advance online publication. <https://doi.org/10.1177/10422587211049745>
- Bennett, T. (2019). *The evidence revolution in education has begun*. Teachwire.
<http://www.teachwire.net/news/the-evidence-revolution-in-education-has-begun>
- Bernal, D. (2018). A conceptual model for decentralized municipal wastewater management. **Water Practice and Technology**, **13*(2)*, Article 460.
<http://dx.doi.org/10.2166/wpt.2018.047>
- Bernasco, W., Elffers, H., & van Gelder, J.-L. (2017). *The Oxford handbook of offender decision making*. Oxford University Press.
- Biholar, R. (2017). "Nutten nah gwaan fi we." Challenges faced by adult ex-inmates upon their release in Jamaica*. Stand Up for Jamaica.
- Bojtor, A., & Bozsó, G. (2020). Comparative analysis of evidence-based policies in the era of digitalization. **Central and Eastern European EDem and Egov Days**, 338, 477-485. <https://doi.org/10.24989/ocg.338.38>
- Borisova, T., Olexa, M. T., & Caracciolo, J. (2021). *2021 handbook of Florida water regulation: Florida springs and Aquifer Protection Act*. University of Florida IFAS Extension. <https://edis.ifas.ufl.edu/publication/FE1019>

- Brunton-Smith, I., & McCarthy, D. (2017). The effects of prisoner attachment to family on re-entry outcomes: A longitudinal assessment. *British Journal of Criminology*, 57(2), 463–482. <https://doi.org/10.1093/bjc/azv129>
- Bunting, A. M., Staton, M., Winston, E., & Pangburn, K. (2019). Beyond the employment dichotomy: An examination of recidivism and days remaining in the community by post release employment status. *International Journal of Offender Therapy and Comparative Criminology*, 63(5), 712–733. <https://doi.org/10.1177/0306624X18808685>
- Byrne, J. M. (2019). The effectiveness of prison programming: A review of the research literature examining the impact of federal, state, and local Inmate programming on post-release recidivism. *Federal Probation Journal*, 84(1), 3–20. https://www.uscourts.gov/sites/default/files/84_1_1_0.pdf
- Cai, J., Ruhil, A., & Gut, D. (2019). *Prison-based education: Programs, participation and proficiency in literacy/numeracy* [Commissioned paper]. U.S. PIAAC.
- Caputo, F., Evangelista, F., & Russo, G. (2018). The role of information sharing and communication strategies for improving stakeholder engagement. In S. M. Riad Shams, D. Vrtonis, Y. Weber, & E. Tsoukatos (Eds.), *Business models for strategic innovation* (pp. 96–138). Routledge.
- Case, A. D. (2017). A critical-positive youth development model for intervening with minority youth at risk for delinquency. *American Journal of Orthopsychiatry*, 87(5), 510-519. <https://doi.org/10.1037/ort0000273>

- Castro, E. L. (2018). Racism, the language of reduced recidivism, and higher education in prison: Toward an anti-racist praxis. *Critical Education*, 9(17).
- Charles Koch Institute. (2018, April 6). *Second chances for prisoners help all of us*.
<https://charleskochinstitute.org/stories/second-chances-for-prisoners-help-all-of-us/>
- Cheeseman, A., Wright, T. S. A., Murray, J., & McKenzie, M. (2019). Taking stock of sustainability in higher education: A review of the policy literature. *Environmental Education Research*, 25(12), 1697–1712.
<https://doi.org/10.1080/13504622.2019.1616164>
- Chesnut, K., & Wachendorfer, A. (2021). *Second Chance Pell: Four years of expanding access to education in prison*. Vera Institute of Justice.
<https://www.vera.org/downloads/publications/second-chance-pell-four-years-of-expanding-access-to-education-in-prison.pdf>
- Chouhy, C., Cullen, F. T., & Lee, F. (2020). A social support theory of desistance. *Journal of Developmental and Life-Course Criminology*, 6, 204–223.
<https://doi.org/10.1007/s40865-020-00146-4>
- Christensen, M., Dyrstad, J., & Innstrand, S. (2020). Academic work engagement, resources, and productivity: Empirical evidence with policy implications. *Studies in Higher Education*, 45(1), 86–99.
<https://doi.org/10.1080/03075079.2018.1517304>
- Cochran, J. C. (2020). Revisiting the effect of visitation and recidivism. *Justice Quarterly*, 37(2), 304–331. <https://doi.org/10.1080/07418825.2018.1508606>

Collins, H. (2021). *Increasing educational prison programs to help reduce recidivism*

(Order No. 28667339). Available from ProQuest One Academic. (2552990166).

Retrieved from <https://www.proquest.com/dissertations-theses/increasing-educational-prison-programs-help/docview/2552990166/se-2>

Company Histories.com. (n.d.). Prison Rehabilitative Industries and Diversified

Enterprises, Inc. (PRIDE). Retrieved August 1, 2022, from [https://www.company-](https://www.company-histories.com/Prison-Rehabilitative-Industries-and-Diversified-Enterprises-Inc-PRIDE-Company-History.html)

[histories.com/Prison-Rehabilitative-Industries-and-Diversified-Enterprises-Inc-](https://www.company-histories.com/Prison-Rehabilitative-Industries-and-Diversified-Enterprises-Inc-PRIDE-Company-History.html)

[PRIDE-Company-History.html](https://www.company-histories.com/Prison-Rehabilitative-Industries-and-Diversified-Enterprises-Inc-PRIDE-Company-History.html)

Council of Economic Advisors. (2018). *Economic report of the president.*

<https://www.govinfo.gov/content/pkg/ERP-2018/pdf/ERP-2018.pdf>

Croux, F., Brosens, D., Vandeveld, S., & De Donder, L. (2019). Foreign national

prisoners in Flanders (Belgium): Motivations and barriers to participation in

prison programmes. *European Journal on Criminal Policy and Research*, 25(2),

171–188. <https://doi.org/10.1007/s10610-018-9372-7>

Davis, L. (2019). Higher Education Programs in Prison: What We Know Now and What

We Should Focus on Going Forward DOI:[10.7249/PE342](https://www.doi.gov/10.7249/PE342)

Davis, L. M., & Linton, J. (2021). *What corrections officials need to know to partner with*

colleges to implement college programs in prisons. RAND.

<https://www.rand.org/pubs/tools/TLA1253-1.html>

- Deffendoll, S. (2018). *Effect of institutional and organizational commitment on correctional officers' perceptions and attitude toward inmates* (Publication No. 10929938) [Doctoral dissertation, Capella University]. ProQuest Dissertations and Theses Global.
- de Mooij, B., Fekkes, M., Scholte, R. H. J., & Overbeek, G. (2020). Effective components of social skills training programs for children and adolescents in nonclinical samples: A multilevel meta-analysis. *Clinical Child and Family Psychology Review*, 23(2), 250–264. <https://doi.org/10.1007/s10567-019-00308-x>
- de Villiers, C., & Molinari, M. (2021). *How to communicate and use accounting to ensure buy-in from stakeholders: lessons for organizations from governments' COVID-19 strategies * [Manuscript submitted for publication]. The University of Auckland Business School.
- Duke, B. (2018). A meta-analysis comparing educational attainment prior to incarceration and recidivism rates in relation to correctional education. *Journal of Correctional Education (1974-)*, 69(1), 44-59.
- Duong, X. B., Phan, A. T., Do, D. N., Dang, X. H., Truong, K. N., & Mai, N. A. (2020). Optimize the feed rate and determine the joints torque for industrial welding robot TA 1400 based on kinematics and dynamics modeling. *International Journal of Mechanical Engineering and Robotics Research*, 9(9), 1335–1340. <https://doi.org/10.18178/ijmerr.9.9.1335-1340>
- Duwe, G. (2018). The Effectiveness of Education and Employment Programming for Prisoners. <https://files.eric.ed.gov/fulltext .pdf ED585975.pdf>

- Eddy, J. M., & Burraston, B. (2018). Programs promoting the successful reentry of fathers from jail or prison to home in their communities. In C. Wildeman, A. R. Haskins, & J. Poehlmann-Tynan (Eds.), *When parents are incarcerated: Interdisciplinary research and interventions to support children* (pp. 109–131). American Psychological Association.
- Ellison, M., Szifris, K., Horan, R., & Fox, C. (2017). A rapid evidence assessment of the effectiveness of prison education in reducing recidivism and increasing employment. *Probation Journal*, *64*(2), 108–128.
<https://doi.org/10.1177/0264550517699290#>
- Engler, C. (2020). Transboundary fisheries, climate change, and the ecosystem approach: taking stock of the international law and policy seascape.
- Evans, D. (2018). The elevating connection of higher education in prison: An incarcerated student's perspective. *Critical Education*, *9*(11), 1–14.
<https://doi.org/10.14288/ce.v9i11.186318>
- Falco, A., Girardi, D., De Carlo, A., Arcucci, E., & Dal Corso, L. (2022). The perceived risk of being infected with COVID-19 at work, communication, and employee health: A Longitudinal application of the job demands-resources model. Sustainability. 2022: 14(2):1037. <https://doi.org/10.3390/su14021037>
- Farrier, A., Baybutt, M., & Dooris, M. (2019). Mental health and wellbeing benefits from a prisons horticultural programme. *International Journal of Prisoner Health*, *15*(1), 91–104. <https://doi.org/10.1108/IJPH-11-2017-0055>

- Florida Department of Corrections. (2020). *Florida prison recidivism report: Releases from 2008 to 2018*. http://www.dc.state.fl.us/pub/recidivism/2019-2020/FDC_AR2019-20.pdf
- Florida Department of Corrections. (2022). *Quarterly recidivism report*. <http://www.dc.state.fl.us/pub/recidivism/2021-22/Quarterly%20Recidivism%20Report%202022-Q1.pdf>
- Florida Department of Education. (2020). *Career and technical education: 2019-2020 technical assistance paper: CTE basic skills assessment requirements*. <https://www.fldoe.org/core/fileparse.php/5398/urlt/basic-skill-tap-att1.pdf>
- Florida Department of Environmental Protection. (n.d.-a). *Division of Water Resource Management*. Retrieved November 4, 2021, from <https://floridadep.gov/water>
- Florida Department of Environmental Protection. (n.d.-b). *Operator certification program publications & forms*. Retrieved November 4, 2021, from <https://floridadep.gov/water/certification-restoration/content/operator-certification-program-publications-forms>
- Fogarty, J., & Giles, M. (2018). *Recidivism and education revisited: Evidence for the USA* [Working Paper No. 1806]. UWA Agricultural and Resource Economics. <http://dx.doi.org/10.22004/ag.econ.275642>
- Fox, C., Smith, A., Hothersall, G., & Harrison, J. (2021). *A rapid evidence assessment to assess the outcomes of community and custody delivered vocational training and employment programs on reoffending*. Policy Evaluation and Research Unit. <https://e-space.mmu.ac.uk/id/eprint/627939>

- Garcés-Ayerbe, C., Rivera-Torres, P., & Suárez-Perales, I. (2019). Stakeholder engagement mechanisms and their contribution to eco-innovation: Differentiated effects of communication and cooperation. *Corporate Social Responsibility and Environmental Management*, 26(6), 1321–1332. <https://doi.org/10.1002/csr.1749>
- GEO Continuum of Care. (2018). *GEO continuum of care 2018 annual report*. <https://www.geogroup.com/Portals/0/coc/CoC%20Annual%20Report%20020719%20FINAL.pdf>
- GEO Continuum of Care. (2020). *GEO 2020 continuum of care annual report*. https://www.geogroup.com/Portals/0/docs/CoC_Annual_Report_2020.pdf
- Gorard, S., See, B., & Siddiqui, N. (2020). What is the best way to get evidence into use in education? *Review of Education*, 8(2), 570–610. <https://doi.org/10.1002/rev3.3200>
- Gulson, K. N., & Sellar, S. (2019). Emerging data infrastructures and the new topologies of education policy. *Environment & Planning D: Society & Space*, 37(2), 350–366. <https://doi.org/10.1177/0263775818813144>
- Guo, S. (2018). A model of religious involvement, family processes, self-control, and juvenile delinquency in two-parent families. *Journal of Adolescence*, 63, 175–190. <https://doi.org/10.1016/j.adolescence.2017.12.015>
- Ha, Y. P., Seifu, L. D., Lewis, L. M., Dupuis, R., Brawber, B. M., & Cannus, C. C. (2018). Partnering medical students with barbers to cut hypertension in Black men. *American Journal of Public Health*, 108(6), 785–787. <https://doi.org/10.2105/AJPH.2018.304374>

- Hamilton, K. L. (2019). Pathway to success: Creating individualized career pathways for inmates and reentrants. *COABE Journal*, 8(1), 54–58.
- Hassan, S., & Usman, M. (2020). Competency training needs of carpentry and joinery trade teachers for improvisation of instructional materials. *Kashere Journal of Education*, 1(1), 51–57.
- Helgetun, J. B., & Menter, I. (2020). From an age of measurement to an evidence era? Policymaking in teacher education in England. *Journal of Education Policy*, 37(1), 88–105. <https://doi.org/10.1080/02680939.2020.1748722>
- Herman, L. (2018). *Tips for writing policy papers: A policy lab communication workshop*. Stanford Law School. <https://www-cdn.law.stanford.edu/wp-content/uploads/2015/04/White-Papers-Guidelines.pdf>
- Hickey, G., McGilloway, S., O'Brien, M., Leckey, Y., Delvin, M., & Donnelly, M. (2018). Strengthening stakeholder buy-in and engagement for successful exploration and installation: A case study of the development of an area-wide, evidence-based prevention and early intervention strategy. *Children and Youth Services Review*, 91, 185–195. <https://doi.org/10.1016/j.childyouth.2018.06.008>
- Hirschi, T. (1969). *Causes of delinquency*. Routledge.
- Hollands, F., Pan, Y., & Escueta, M. (2019). What is the potential for applying cost utility analysis to facilitate evidence-based decision-making in schools? *Educational Researcher*, 48(5), 287–295. <https://doi.org/10.3102/0013189X19852101>

Holmes, M., & Waliczek, T. (2019). The effect of horticultural community service programs on recidivism. *HortTechnology*, 39(4), 490–495.

<https://doi.org/10.21273/HORTTECH04282-19>

Hudson, B., Hunter, D., & Peckham, S. (2019). Policy failure and the policy-implementation gap: Can policy support programs help? *Policy Design and Practice*, 2(1), 1–14.

<https://doi.org/10.1080/25741292.2018.1540378>

Institutional Review Boards (IRBs) and Protection of Human Subjects in Clinical Trials.

(2019). Retrieved from <https://fda.gov>

Jakobs, J. (2019). *Effects of prison program participation on recidivism outcomes*

[Master's Thesis, Old Dominion University]. ODU Digital Commons.

https://digitalcommons.odu.edu/cgi/viewcontent.cgi?article=1039&context=sociology_criminaljustice_etds

Jalongo, M. R. (Ed.). (2019). *Prison dog programs renewal and rehabilitation in correctional facilities*. Springer.

Jefferson, A. M., & Schmidt, B. E. (2019). Concealment and revelation as bureaucratic and ethnographic practice: Lessons from Tunisian prisons. *Critique of Anthropology*, 39(2), 155–171.

<https://doi.org/10.1177%2F0308275X19842922>

Joshi, R. V. S. (2017). The significance of andragogy in present day higher education:

“Creating and implementing with a learning experience in an atmosphere of competency, commitment & credibility.” *International Journal of Innovative Science and Research Technology*, 2(5), 7–11. <https://ijisrt.com/wp-content/uploads/2017/05/The-Significance-of-Andragogy-in-present-day-higher-Education.pdf>

Jozan, A. R. (2020). *Loneliness, prosocial relationships, and recidivism in long-term incarcerated juveniles* [Doctoral dissertation, Walden University]. Walden University ScholarWorks.

<https://scholarworks.waldenu.edu/cgi/viewcontent.cgi?article=10429&context=dissertations>

Kadum, H. A., Ibrahim, N. H., & Attiya, A. H. J. (2020). Legislative public international law mechanisms to combat modern technology crimes. *PALARCH's Journal of Archaeology of Egypt/Egyptology*, 17(7), 6455–6474.

<https://www.archives.palarch.nl/index.php/jae/article/view/2981/2916>

Kaplan, O., & Nussio, E. (2018). Explaining recidivism of ex-combatants in Colombia. *Journal of Conflict Resolution*, 62(1), 64–93.

<https://doi.org/10.1177%2F0022002716644326>

- Király, O., Potenza, M. N., Stein, D. J., King, D. L., Hodgins, D. C., Saunders, J. B., Griffiths, M. D., Gjoneska, B., Billieux, J., Brand, M., Abbott, M. W., Chamberlain, S. R., Corazza, O., Burkauskas, J., Sales, C. M. D., Montag, C., Lochner, C., Grünblatt, E., Wegmann, E., ... Demetrovics, Z. (2020). Preventing problematic internet use during the COVID-19 pandemic: Consensus guidance. *Comprehensive Psychiatry, 100*, Article 152180.
<https://doi.org/10.1016/j.comppsy.2020.152180>
- Kogan, M. (2018). *Educational policymaking: A study of interest groups and parliament*. Routledge.
- Koskimaa, V., Rapeli, L., & Hiedanpää, J. (2021). Governing through strategies: How does Finland sustain a future-oriented environmental policy for the long term? *Futures, 125*, Article 102667. <https://doi.org/10.1016/j.futures.2020.102667>
- Lacey, T. A., Toossi, M., Dubina, K. S., & Gensler, A. B. (2017). Projections overview and highlights, 2016-26. *Monthly Lab. Rev., 140*, 1.
- Laerd Statistics. (n.d.). *Homepage*. Retrieved November 1, 2021, from <https://statistics.laerd.com/>
- La Roi, S. G. (2022). *Correctional Education: A pathway to reducing recidivism in Wisconsin* [Honor's project, Lawrence University]. LUX.
<https://lux.lawrence.edu/cgi/viewcontent.cgi?article=1173&context=luhp>

- Lee, A.-Y., Kim, S.-Y., Kwon, H. J., & Park, S.-A. (2021). Horticultural therapy program for mental health of prisoners: Case report. *Integrative Medicine Research, 10*(2), Article 100495. <https://doi.org/10.1016/j.imr.2020.100495>
- Lewis, S. (2017). *A control theory examination of reentry programming* (Publication No. 10681087) [Master's thesis, The University of Alabama at Birmingham]. ProQuest Dissertations and Theses Global.
- Ma, J., Pender, M., & Welch, M. (2019). *Education pays 2019: The benefits of higher education for individuals and society*. College Board Trends in Higher Education Series. <https://research.collegeboard.org/media/pdf/education-pays-2019-full-report.pdf>
- Macheke, B. (2018). Welding—The miracle career. *Journal of the Southern African Institute of Mining and Metallurgy, 118*(10), x. <http://www.scielo.org.za/pdf/jsaimm/v118n10/17.pdf>
- Magee, G. (2021). Education reduces recidivism. *Technium Social Sciences Journal, 16*(1), 175–182. <https://doi.org/10.47577/tssj.v16i1.2668>
- Maier, W. B. (2018). *Prison higher education and recidivism: A matched comparison among A.A., vocational training, and non-degree earning inmates* [Doctoral dissertation, Washington State University]. Research Exchange. <https://rex.libraries.wsu.edu/esploro/outputs/99900581509301842>
- Maimon, D., & Louderback, E. R. (2019). Cyber-dependent crimes: An interdisciplinary review. *Annual Review of Criminology, 2*, 191–216. <https://doi.org/10.1146/annurev-criminol-032317-092057>

- Mallion, J. S. (2021). Good lives model: Importance of interagency collaboration in preventing violent recidivism. *Societies*, 2021(11), Article 96.
<https://doi.org/103390/soc11030096>
- Martilik, A. M. (2018). *A phenomenological analysis of formerly incarcerated women's perceptions of successful reentry* (Publication No. 10837493) [Doctoral dissertation, Walden University]. ProQuest Dissertations and Theses Global.
- Mbatha, C. M., Kerre, B. W., Ferje, A., & Kitainge, K. M. (2019). How effective is vocational education and training for rehabilitation in Kenya prisons? A study protocols. *American Journal of Educational Research*, 7(10), 677–693.
- McDaniel, M., Sutter, C., Webb, J. W., Elgar, F. J., Parker, K. F., & Nwachu, J. (2021). Breaking the cycle of crime: Promoting the positive social spillover potential of entrepreneurship. *Journal of Business Venturing Insights*, 16, e00249.
- Mehta, S. (2022). Updating WIOA to empower workers and create sheared prosperity. Retrieved from [www. CLASP.org](http://www.CLASP.org)
- Michaels, D., & Wagner, G. R. (2020). Occupational Safety and Health Administration (OSHA) and worker safety during the COVID-19 pandemic. *JAMA*, 324(14), 1389–1390. <https://doi.org/10.1001/jama.2020.16343>
- Mikulić, I., Lisjak, D., & Štefanić, N. (2021). A Rule-Based System for Human Performance Evaluation: A Case Study. *Applied Sciences*, 11(7), 2904.
<https://doi.org/10.3390/app11072904>

- Millenky, M., & Hossain, F. (2019). A Research-Practice Partnership to Strengthen a Program for Girls at Risk of Justice System Involvement: A Case Study of PACE Center for Girls. Issue Focus. *MDRC*.
- Miller, S. (2021). Higher Education behind Bars: Expanding Post-Secondary Educational Programs in New England Prisons and Jails. *New England Board of Higher Education*.
- Muduli, A., & Raval, D. (2018). Examining the role of work context, transfer design and transfer motivation on training transfer: Perspective from an Indian insurance industry. *European Journal of Training and Development*, 42(3/4), 266-282.
- NCCER Support. (n.d.). *Accreditation process overview*. Retrieved November 4, 2021, from <https://support.nccer.org/support/solutions/articles/5000626651-accreditation-process-overview>
- Ndunagu, J., Tanglang, N., & Osang, F. (2020). Examining prison education and recidivism in Nigerian correctional centers: The information and communication technology (ICT) remedy. *Annals: Computer Science Series*, 18(2), 46–51.
- Nelson, R. J., & Vincent, G. M. (2018). Matching services to criminogenic needs following comprehensive risk assessment implementation in juvenile probation. *Criminal Justice and Behavior*, 45(8), 1136–1153.
<https://doi.org/10.1177/0093854818780923>

Newton, D., Day, A., Giles, M., Wodak, J., Graffam, J., & Baldry, E. (2018). The impact of vocational education and training programs on recidivism: A systematic review of current experimental evidence. *International Journal of Offender Therapy and Comparative Criminology*, 62(1), 187–207.

<https://doi.org/10.1177%2F0306624X16645083>

Ngo, T., Lohmann, G., & Hales, R. (2018). Collaborative marketing for the sustainable development of community-based tourism enterprises: Voices from the field. *Journal of Sustainable Tourism*, 26(8), 1325–1343.

<https://doi.org/10.1080/09669582.2018.1443114>

Nickrand, H. L., & Brock, C. M. (2017). Culinary grief therapy: Cooking for one series. *Journal of Palliative Medicine*, 20(2), 181–183.

<https://doi.org/10.1089/jpm.2016.0123>

NIH Grants & Funding. (2019). Vulnerable and other populations requiring additional protection. Retrieved June 28, 2022, from

<https://grants.nih.gov/policy/humansubjects/policies-and-regulations/vulnerable-populations.htm>

Nikolaev, B. (2018). Does higher education increase hedonic and eudemonic happiness? *Journal of Happiness Studies*, 19(2), 483–504. <https://doi.org/10.1007/s10902-016-9833-y>

Novak, A., & Fagan, A. (2022). Expanding research on the school-to-prison pipeline: Examining the relationships between suspension, expulsion, and recidivism among justice-involved youth. *Crime & Delinquency*, 68(1), 3-27.

Núñez, J. C., Regueiro, B., Suárez, N., Piñeiro, I., Rodicio, M. L., & Valle, A. (2019).

Student perception of teacher and parent involvement in homework and student engagement: The mediating role of motivation. *Frontiers in Psychology, 10*, Article 1384. <https://doi.org/10.3389/fpsyg.2019.01384>

Occupational Safety and Health Administration. (2017). *Workers' rights*.

<https://www.osha.gov/sites/default/files/publications/osha3021.pdf>

Office of Program Policy Analysis and Government Accountability. (n.d.). *Prison*

Rehabilitative Industries and Diversified Enterprises, Inc. Retrieved June 28, 2022, from

<https://oppaga.fl.gov/ProgramSummary/ProgramDetail?programNumber=1037>

Oleson, J. C., & Costello, B. J. (Eds.). (2019). *Fifty years of causes of delinquency*,

Volume 25: The criminology of Travis Hirschi. Routledge.

Oosterhoff, B., Kaplow, J. B., Wray-Lake, L., & Gallagher, K. (2017). Activity-specific

pathways among duration of organized activity involvement, social support, and adolescent well-being: Findings from a nationally representative sample. *Journal of Adolescence, 60*, 83–93. <https://doi.org/10.1016/j.adolescence.2017.07.012>

Parkhurst, J. (2017). *The politics of evidence: From evidence-based policy to the good governance of evidence*. Taylor & Francis.

Peled, E. (2017). *Recidivism in the United States: A policy prescription to reduce our nation's high rate of recidivism* [Honor's thesis, Stern College for Women].

Yeshiva Academic Institutional Repository.

<https://repository.yu.edu/handle/20.500.12202/4078>

Prasath, P. R., & Copeland, L. (2021). Rationale and benefits of using play therapy and expressive art techniques in supervision. In L. J. Fazio-Griffith & R. Marino (Eds.), *Techniques and interventions for play therapy and clinical supervision* (pp. 17–37). IGI Global.

Ramsey, M. (2020). *Sex offenders and the PCL-R: Can crime behavior predict psychopathy based on factor and facet score elevations?* (Publication No. 27956627) [Doctoral dissertation, Alliant International University]. ProQuest Dissertations and Theses Global.

Rather, R. A., & Parray, S. H. (2018). Customer engagement in increasing affective commitment within hospitality sector. *JOHAR*, 13(1), 73–91.

Reutter, D. (2005, January 15). *Florida's private prison industry corporation under siege*. Prison Legal News.

<https://www.prisonlegalnews.org/news/2005/jan/15/floridas-private-prison-industry-corporation-under-siege/>

Rodolfa, K. T., Salomon, E., Haynes, L., Mendieth, I. H., Larson, J., & Ghani, R. (2020). Case study: predictive fairness to reduce misdemeanor recidivism through social service interventions <https://doi.org/10.1145/3351095.3372863>

Rose, E. K., & Shem-Tov, Y. (2021). How does incarceration affect reoffending? estimating the dose-response function. *Journal of Political Economy*, 129(12), 3302-3356. Sancar, R., Atal, D., & Deryakulu, D. (2021). A new framework for teachers' professional development. *Teaching and Teaching Education*, 101, Article 103305. <https://doi.org/10.1016/j.tate.2021.103305>

- Schweitzer, M., Labrecque, R. M., & Smith, P. (2017). Reinvesting in the lives of youth: A targeted approach to reducing recidivism. *Criminal Justice Policy Review*, 28(3), 207–219. <https://doi.org/10.1177%2F0887403415579262>
- Seigfried-Spellar, K. C., Villacís-Vukadinović, N., & Lynam, D. R. (2017). Computer criminal behavior is related to psychopathy and other antisocial behavior. *Journal of Criminal Justice*, 51, 67–73. <https://doi.org/10.1016/j.jcrimjus.2017.06.003>
- Sihite, O. B., Andika, C. B., & Prasetya, A. B. (2020). A literature review: Does transformational leadership impact and be effective in the public bureaucratic. *International Journal of Social, Policy and Law*, 1(1), 44–50. <https://doi.org/10.8888/ijospl.v1i1.16>
- Smith, T. V., III, & Johnson, T. W. (2022). Hope for the hopeless: The Prison Resources Repurposing Act. *North Carolina Law Review*, 100(3), Article 2. <https://scholarship.law.unc.edu/cgi/viewcontent.cgi?article=6873&context=nclr>
- Tibbetts, S. G., & Hemmens, C. (2009). *Criminological theory: A text/reader* (2nd ed.). Sage.
- United States Department of Justice Archives. (n.d.). *Prison reform: Reducing recidivism by strengthening the Federal Bureau of Prisons*. <https://www.justice.gov/archives/prison-reform>
- Urombo, L., & Kasimba, R. (2018). Factors behind recidivism at Chikurubi Farm Prison in Zimbabwe. *Journal of African Foreign Affairs*, 5(3), 103–118. <https://doi.org/10.31920/2056-5658/2018/v5n3a6>

- U.S. Bureau of Labor Statistics. (n.d.). *Occupational outlook handbook: Heavy and tractor-trailer truck drivers*. Retrieved November 3, 2021, from <https://www.bls.gov/ooh/transportation-and-material-moving/heavy-and-tractor-trailer-truck-drivers.htm>
- U.S. Bureau of Labor Statistics. (2022). *Occupational outlook handbook: Welders, cutters, solderers, and brazers*. Retrieved November 4, 2021, from <https://www.bls.gov/ooh/production/welders-cutters-solderers-and-brazers.htm>
- Van Bruggen, A., Zonneveld, M., Zijp, M. C., & Posthuma, L. (2022). Solution-focused sustainability assessments for the transition to the circular economy: The case of plastics in the automotive industry. *Journal of Cleaner Production*, *358*, Article 131606. <https://doi.org/10.1016/j.jclepro.2022.131606>
- Viljoen, J. L., & Cochrane, D. M. (2018). Do risk assessment tools help manage and reduce risks of violence and reoffending? A systematic review. *Law and Human Behavior*, 43(3), 181–214. <https://doi.org/10.1037/lhb0000280>
- Vlaszof, N. (2017). *Motivations to return to a gang after severe physical victimization* [Doctoral dissertation, Walden University]. Walden University ScholarWorks. <https://scholarworks.waldenu.edu/dissertations/4688/>

- Wali, A., Khan, D., Safdar, N., Shawani, Z., Fatima, R., Yaqoob, A., Qadir, A., Ahmed, S., Rashid, H., Ahmed, B., & Khan, S. (2019). Prevalence of tuberculosis, HIV/AIDS, and hepatitis; in a prison of Balochistan: A cross-sectional survey. *BMC Public Health*, *19*(1), Article 1631. <https://doi.org/10.1186/s12889-019-8011-7>
- Wickert, C., & Risi, D. (2019). *Corporate social responsibility*. Cambridge University Press.
- Williamson, B., & Piattoeva, N. (2019). Objectivity as standardization in data-scientific education policy, technology and governance. *Learning, Media and Technology*, *44*(1), 64-76. <https://doi.org/10.4324/9780429341359-7>
- Yadav, A., & Agarwal, S. (2020). Occupational health and level of awareness among welders. *Journal of the Social Sciences*, *48*(4), 543–552.
- Yuan, Y., Feng, B., Lai, F., & Collins, B. J. (2018). The role of trust, commitment, and learning orientation on logistic service effectiveness. *Journal of Business Research*, *93*, 37–50. <https://doi.org/10.1016/j.jbusres.2018.08.020>

Appendix: The Project

Lowering Recidivism Through Higher Education and Apprenticeship Programs

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Executive Summary

The PRCF's mission statement makes a commitment to the inmates in their care.

The PRCF is

committed to providing leading rehabilitation programs to individuals while in custody and post-release into the community through the [PRCF] Continuum of Care. [PRCF's] diversified services platform provides unique capabilities for the delivery of educational and vocational programs, cognitive behavioral and substance abuse treatment, and faith-based services across the entire corrections spectrum. (GEO Continuum of Care, 2020, para. 1)

To demonstrate our commitment, we offer 12 vocational training programs and certifications to equip inmates with the necessary skills to remain in society and not recidivate.

Defining the Problem

The problem addressed in the study was that, although the local PRCF and State of Florida have access to quantitative data regarding recidivism and inmates who participated in the 12 vocational training programs, neither the PRCF nor the state have examined those data to see if the two variables are related. Therefore, the focus of the research was to identify if there is an association between vocational training programs and recidivism.

Data and Evidence

The study addressed the gap in practice by analyzing available quantitative data to understand the association between completing a vocational training program and the

recidivism of formerly incarcerated persons. The study findings, based on the results of the RQ, revealed that the 12 vocational training programs offered at the local PRCF had no statistically significant effect on reducing recidivism.

Recommendations

Recommendation #1: Develop Partnerships with Local Colleges

The first recommendation is to partner with and enroll inmates at local colleges that offer associate and bachelor's degrees. In their examination of eight prisons in the United States that focus on community–corrections partnerships, Dewey et al. (2021) found that such partnerships provided a sense of purpose for prisoners, prepared them for reentry, and helped them establish relevant community connections.

Recommendation #2: Develop Partnerships with Local Businesses

Forming partnerships with local businesses allows inmates to participate in apprenticeship programs that will ensure job security upon their release. Although this study does not refer to employment as a factor in reducing recidivism, being able to support oneself through employment is a crucial factor to consider when formulating plans to reduce recidivism. If inmates have no hope for a meaningful future, there will be no motivation for them to consider practicing positive behavior changes (Smith & Johnson, 2022).

Call to Action

If these recommendations are accepted, these policies will strengthen the PRCF's community relationships, better equip inmates to return to society, and lower recidivism rates. Inmates with degrees in vocational higher education will have necessary skills for

employment. Waife (2020) that reported inmates who returned to society with degrees in higher education and skills were more likely to become gainfully employed. Moreover, employed ex-inmates are less likely to return to a life of crime, and offer value and are viewed as more beneficial to the community. Additionally, by equipping inmates to return to society, the PRCF will fulfill their commitment to the community, uphold their mission, and fulfill their goals.

Introduction

Voluminous research identifies higher education as a means to reduce recidivism. (Achebe, 2021; Magee, 2021; Vooren et al., 2022; & Wright, 2022). Although the PRCF implemented an educational program for the inmates in their care, Florida Department of Corrections reported recidivism rates at 24.5% in 2014, 24.7% in 2015, and 25.45% in 2016 (Florida Department of Corrections, 2020). Additionally, the local PRCF published recidivism reports showing annual increased rates in recidivism for the years 2012, 2013, and 2014 (GEO Continuum of Care, 2018).

The Problem

The problem that prompted the study and this policy paper recommendation is the high rates of recidivism at the PRCF despite the facility offering 12 vocational training programs for inmates. The PRCF and State of Florida have access to quantitative data on inmates' participation in vocational training programs and annual recidivism rates; however, neither the PRCF nor the state have analyzed if there is an association between the two variables until now. This study findings indicated that inmates' participation in

vocational training programs as a form of rehabilitation may not have met the facility's desired goals of lowering recidivism.

The Purpose

The purpose of the study was to address a gap in practice by examining the association between vocational training programs and recidivism. The study revealed no statistically significant association between the variables. Therefore, this project's purpose aligns with the study findings, and recommendations to address the problems are outlined. The recommendations focus on lowering recidivism through higher education and apprenticeship programs. This project addresses a policy supported by evidence-based, data-driven information.

Methodology

RQ

The study was guided by the following RQ:

RQ: What is the statistically significant association between completing a specific vocational training program, from the 12 offered at the PRCF, in culinary arts, horticulture, carpentry, welding, basic computer training, advanced computer training, barbering, CDL, hospitality and tourism, business education, wastewater management, and environmental services, and recidivism for inmates released from a local PRCF in South Florida in 2012, 2013, and 2014? Recidivism is based on returning to prison within 5 years of release.

Study Design

This quantitative study utilized a correlational research design that measured the two variables. The independent variable was comprised of the 12 vocational training programs offered at the PRCF, whereas the dependent variable was recidivism. This analysis provided a clear and concise understanding of the effectiveness of the facility's vocational program and addressed the problem of inmates' recidivism. A chi-square test for association was applied using SPSS version 28. The study met the quantitative data requirement through implementing a quantitative methodology, utilizing a secondary quantitative data design, and including approximately 587 participants.

Evidence-Informed Literature

Inmates complete their sentences, return to society, and recidivate for numerous reasons. The Florida Department of Corrections defines recidivism as a return to prison, as the result of either a new conviction or a violation of post-prison supervision, within 3 to 5 years of their prison release date (Inch, 2021). The PRCF uses 5 years to measure recidivism and would like to improve the rates of recidivism among inmates who have completed their sentences at the facility. Bozick et al. (2018) reported that inmates who participated in educational programs are 28% less likely to recidivate and more likely to obtain employment. Additionally, Duwe (2018) suggested that, if the United States invested in education and employment programming, the country would see better recidivism outcomes. Further, to support the study's recommendations, Vandala's (2019) quantitative findings overwhelmingly demonstrated that education transformed offenders. Further, Vandala's qualitative findings confirmed that correctional education changed

behavior, boosted self-confidence, and transformed offenders into law-abiding and productive citizens.

Inmates with high school diplomas participate in the PRCF's vocational training programs. Upon program completion, the inmates receive certificates from the Florida Department of Education and other state agencies. The PRCF vocational programs curricula are similar to the curricula offered at local colleges; therefore, it would be a motivating factor for inmates to obtain college credits for work they have already completed.

Analysis of Findings

The chi-square test of association was used to determine if there was any association between two nominal variables. To effectively conduct a chi-square test of association, the following four assumptions should be considered, these are:

1. The two variables should be either ordinal or nominal, that is, categorical data. The variables generally take on values that are the names or labels.
2. All observations are independent. This means that the value of one observation in the data set has no effect of the value of any other observation.
3. The variables are mutually exclusive. This means that individuals can only belong to one cell table.
4. The expected value of cells should be greater than 5 in at least 80% of the cells.

This study readily met the first three assumptions; however, the fourth assumption was violated because three cells did not yield enough respondents to fulfill the requirements of the fourth assumption. Therefore, the categories of environmental services, hospitality and tourism, and wastewater management collapsed and added into the category of other. This process led to the completion of the chi-square test without any violations.

For this study, statistical analyses included data obtained from the chi-square test of a total of 372 inmates who participated in one vocational training program and left the local PRCF between January 1, 2012, and December 31st, 2014. A chi-square test of independence was conducted between vocational training programs and recidivism. All, except one cell frequency was greater than five, however, the cell met the chi-square minimum expected count. There was not a statistically significant association between vocational training programs and recidivism. In the cross tabulation, one cell had an expected count of 4.5; however, the cell met the chi-square minimum expected count. The chi-square statistics was equal to 2.659, compared with the chi-square distribution, which was equal to 6 degrees of freedom. The p value was .850, which is greater than .05; this indicates a result that is not statistically significant. There was no association between vocational training programs taken and recidivism. Therefore, I could not reject the null hypothesis and could not accept the alternative hypothesis.

Project Recommendations

The recommendations for the project are intended to improve recidivism rates at the PRCF. The two recommendations are as follows:

1. Develop partnerships with local colleges.
2. Develop partnerships with local businesses.

Recommendation 1: Develop Partnerships with Local Colleges

Recommendation 1 suggests enrolling inmates in higher education programs to enable them to obtain an associate or bachelor's degree. If lowering recidivism is the dominant desired outcome in the prison system, opportunities for higher education should be made available (Castro, 2018). The impact of higher education lasts beyond prison walls and extends into the home and communities of ex-inmates. Researchers at Northwestern Prison Education Program (n.d.) tracked 404,638 released prisoners and found that 67.8% of the released prisoners were rearrested within 3 years, and more than 76.6% were rearrested within 5 years. However, there was a 43% reduction in the recidivism rates of inmates who participated in educational programs. The study reported that, the higher the degree, the lower rates of recidivism. Inmates who received an associate degree had recidivism rates of 14%, and inmates who obtained a bachelor's degree had recidivism rates of 5.6%.

The PRCF currently partners with Certell Inc. This program utilizes instructors from Florida Atlantic University to teach civics education at the PRCF. Classes are held at the facility once per week and are free to the inmates. Certell aims to give students a sensible, informed foundation so they can think critically and engage constructively with others (Certell, n.d.). Therefore, this strategy is one avenue the facility administrators could explore for providing higher educational courses to the inmates.

Evans et al. (2017) reported that inmates who participated in higher education had an enhanced sense of empowerment and motivation. The researcher further stated that these inmates resisted negative behavior, which is an important factor in viewing themselves positively and ultimately improves their reentry and life trajectory.

Recommendation 2: Develop Partnership with Local Businesses

PRIDE is a private company that works with correctional institutions in Florida to train inmates for employment when they return to society. The company's mission is

To provide a joint effort between the Department of Corrections, the correctional work program, and other vocational training programs to reinforce relevant education, training, and post-release job placements and help reduce recidivism. (Office of Program Policy Analysis and Government Accountability, n.d., para. 3)

PRIDE has helped Florida achieve lower recidivism rates through their subcompany, Labor Line, a staffing company that finds jobs for former prisoners (Office of Program Policy Analysis and Government Accountability, n.d.). PRIDE also reported that the recidivism rate for inmates who participated in the program in 1995–1996 was 12.7%, whereas the nation reported 60% for the same period.

The vocational training courses that are not currently offered for higher education, can be supported through the PRIDE programs. This avenue would ensure that all inmates could participate in classes that prepare them with the skills needed for employment. Studies show that the effect of such training helps to lower recidivism (Bozick et al., 2018; Cai et al., 2019; Cale et al., 2018).

Next Steps Following Policy Acceptance

Upon approval, these policy recommendations will follow the PRCF's guidance as outlined in the facility's policies and procedures manual. The PRCF has a dual-governance system; therefore, the executive and administrative staff will discuss and recommend adopting the policy proposals to the Director of Programs.

The Director of Programs has established relationships with local colleges and the PRIDE organization. Therefore, it will be the Programs Director responsibility to communicate the new policies to the local colleges, the PRIDE organization, the inmates, and the instructors. In addition, the Program Director will be responsible for overseeing the initiation of the new policy, monitoring its progress through the approved process, and ensuring compliance with the PRCF's policies.

Conclusion

The new policies were developed using evidence-based data and will be beneficial to the PRCF. The policy recommendations focus on ways to lower recidivism and help the PRCF fulfill its mission. Implementing new policies and providing clear understanding of their goals may motivate more inmates to participate in educational and work programs. Such programs could also influence postprison behavior and could enrich the lives of inmates who return to society.

References

- Achebe, I. Y. (2021). Education Over Incarceration: Reducing Recidivism and Mitigating the Impact and Collateral Consequences of Mass Incarceration and Hyper incarceration through Higher Education, Behavioral and Health Interventions, and Positive Development Programs <http://dx.doi.org/10.34944/dspace/6547>
- Bozick, R., Steele, J., Davis, L., & Turner, S. (2018). Does providing inmates with education improve post release outcomes? A meta-analysis of correctional education programs in the United States. *Journal of Experimental Criminology*, 14, 389–428. <https://doi.org/10.1007/s11292-018-9334-6>
- Cai, J., Ruhil, A. V. S., & Gut, D. M. (2019). *Prison-based education: Programs, participation, and proficiency in literacy/numeracy*. U.S. PIAAC. https://static1.squarespace.com/static/51bb74b8e4b0139570ddf020/t/5c701a794e17b60293c15fd6/1550850681961/2018_Cai_Ruhil_Gut_Prison-Based_Education.pdf
- Cale, J., Day, A., & Casey, S. (2018). Australian prison vocational education and training and returns to custody among male and female ex-prisoners: A cross-jurisdictional study. *Australian & New Zealand Journal of Criminology*, 52(1), 129–147. <https://doi.org/10.1177%2F0004865818779418>
- Castro, E. L. (2018). Racism, the language of reduced recidivism, and higher education in prison: Toward an anti-racist praxis. *Critical Education*, 9(17), 1–19.

DOI <https://doi.org/10.14288/ce.v9i17.186357>

Certell. (n.d.). *Homepage*. Retrieved June 16, 2022, from <https://certell.org>

Dewey, S., Barry, R., Hankel, J., Anasti, T., Lockwood-Roberts, S., Gilmer, B., &

Dolliver, M. (2021). "The problem's too big for us": The promises and perils of community-corrections partnerships. *Corrections*. Advance online publication.

<https://doi.org/10.1080/23774657.2021.1936293>

Duwe, G. (2018). *The effectiveness of education and employment programming for prisoners* (ED585975). ERIC. <https://files.eric.ed.gov/fulltext/ED585975.pdf>

Florida Department of Education. (2020). *Career and technical education: 2019-2020 technical assistance paper: CTE basic skills assessment requirements*.

<https://www.fldoe.org/core/fileparse.php/5398/urlt/basic-skill-tap-att1.pdf>

GEO Continuum of Care. (2018). *GEO continuum of care 2018 annual report*.

<https://www.geogroup.com/Portals/0/coc/CoC%20Annual%20Report%20020719%20FINAL.pdf>

GEO Continuum of Care. (2020). *GEO 2020 continuum of care annual report*.

https://www.geogroup.com/Portals/0/docs/CoC_Annual_Report_2020.pdf

Inch, M. (2021). *Florida prison recidivism report: Releases from 2008 to 2019*. Florida Department of Corrections.

<http://www.dc.state.fl.us/pub/recidivism/RecidivismReport2021.pdf>

Magee, G. (2021). Education Reduces Recidivism. *Technium Soc. Sci. J.*, 16, 175.

- Northwestern Prison Education Program. (n.d.). *Benefits of prison education*. Retrieved June 17, 2022, from <https://sites.northwestern.edu/npep/benefits-of-prison-education/>
- Office of Program Policy Analysis and Government Accountability. (n.d.). Prison Rehabilitative Industries and Diversified Enterprises, Inc. Retrieved June 28, 2022, from <https://oppaga.fl.gov/ProgramSummary/ProgramDetail?programNumber=1037>
- Smith, T. V., III, & Johnson, T. W. (2022). Hope for the hopeless: The Prison Resources Repurposing Act. *North Carolina Law Review*, 100(3), Article 2. <https://scholarship.law.unc.edu/cgi/viewcontent.cgi?article=6873&context=nclr>
- Vandala, N. G. (2019). The transformative effect of correctional education: A global perspective. *Cogent Social Sciences*, 5(1), Article 1677122. <https://doi.org/10.1080/23311886.2019.1677122>
- Vooren, M., Rud, I., Cornelisz, I. *et al.* The effects of a restorative justice programme (Halt) on educational outcomes and recidivism of young people. *J Exp Criminol* (2022). <https://doi.org/10.1007/s11292-022-09502-4>
- Waife, E. A. (2020). Willingness of employers to employ ex-convicts among selected SMEs in the western region of Ghana. *Cogent Social Sciences*, 7(1), Article 1868670. <https://doi.org/10.1080/23311886.2020.1868670>
- Wright, R. E. (2022, June 21). *Reducing recidivism and encouraging desistance: A social entrepreneurial approach*. Journal of Entrepreneurship and Public Policy. Retrieved August 13, 2022, from

<https://www.emerald.com/insight/content/doi/10.1108/JEPP-05-2022-0058/full/html>