2019

Recidivism Differences and Measures of Predictability for Federally Convicted Child Pornographers

Ricardo J. Rodriguez
Walden University

Walden University

College of Social and Behavioral Sciences

This is to certify that the doctoral dissertation by

Ricardo J. Rodriguez

has been found to be complete and satisfactory in all respects,
and that any and all revisions required by
the review committee have been made.

Review Committee
Dr. Joseph Pascarella, Committee Chairperson,
Criminal Justice Faculty

Dr. David DiBari, Committee Member,
Criminal Justice Faculty

Dr. John Walker, University Reviewer,
Criminal Justice Faculty

Chief Academic Officer
Eric Riedel, Ph.D.

Walden University
2019

Abstract

Recidivism Differences and Measures of Predictability for Federally Convicted Child

Pornographers

by

Ricardo J. Rodriguez

MS, St. Thomas University, 2008

BA, Florida Atlantic University, 2005

Dissertation Submitted in Partial Fulfillment

of the Requirements for the Degree of

Doctor of Philosophy

Criminal Justice

Walden University

August 2019

Abstract

There is a gap in research on the effectiveness of mandatory-minimum sentences on the recidivism rates of federal child pornography offenders, resulting in policy that may be ineffective and costly. Relevant research can further understanding of criminogenic behavior that results in the exploitation of children and aid future policy making decisions. Therefore, the purpose of this study was to better understand the relationship between federal sentencing and federal child pornographer recidivism. Central to this study is the research question of whether there exists a statistically significant difference between the likelihood of recidivism in 2 child pornographer cohorts that receive different sentences, probation or mandatory incarceration. The employed frameworks for this study were retributivism and the self-regulation model. A quantitative analysis was used to examine the recidivism rates of the 2 different cohorts as well as the predictive value of various factors related to recidivism. The sample population consisted of 70 offenders convicted of a federal child pornography offense between 2012 and 2016 from 3 states and 7 federal judicial districts. Purposive sampling was employed via publicly available secondary data. Key findings revealed that the analyzed data does not support the existence of a relationship between recidivism and the given sentence. Second, crime of conviction was the only examined factor that supported predictability for future recidivism. The implications of this study will mean evidence for potential policy modifications, alteration of an existing economically draining strategy, and the positive social change of reduced harm and exploitation of children.

Recidivism Differences and Measures of Predictability for Federally Convicted Child

Pornographers

by

Ricardo J. Rodriguez

MS, St. Thomas University, 2008

BA, Florida Atlantic University, 2005

Dissertation Submitted in Partial Fulfillment

of the Requirements for the Degree of

Doctor of Philosophy

Criminal Justice

Walden University

August 2019

Dedication

This dissertation is dedicated to the protectors of the vulnerable—the passionate heroes who work tirelessly to help those who often cannot help themselves. For the calling of sacrifice in service to others be it military or law enforcement is a noble and just cause. J. Edgar Hoover once said, "no amount of law enforcement can solve a problem that goes back to the family." Although this may be true, the continued pursuit of child exploitation eradication will undoubtedly assuage at least one family problem: predation.

Acknowledgments

I would like to acknowledge the guidance and support of my committee members:

Drs. Joseph Pascarella and David DiBari. The assistance and constructive feedback you

provided has made a tremendous difference throughout this entire process. I especially

want to give an extra nod of gratitude for the patience Dr. Pascarella demonstrated

despite the endless string of e-mails and texts, the steady and responsive support did more

than guide this study. Thank you also to Drs. Jenny Ricketts and Jaime Bestard. Your

support, expertise and countless hours of help were of remarkable value.

When it comes to support, I have had no greater pillar than my loving wife,

partner, and best friend, Sarah. Her unwavering love and encouragement continue to be

the warm light that has penetrated every cloud of challenge and setback I have

encountered. You have witnessed the late nights and long hours; you have been a

valuable sounding board in every facet of life to include this study. Thank you, from the

bottom of my heart, I render the highest level of gratitude for being a tremendous wife,

mother, and friend. You are a blessing like no other.

To my son Tristan, my "Monkey Bunkey," the light of my life, thank you. Your

sweet smile, warm hugs, and endless encouragement to successfully complete my "doctor

school" has been pivotal fuel for my fire and needed every step of the way. One of the

goals of this study is to contribute to the discussion of child protection. What I do

professionally and academically begins with the sincerest desire to make this world a

better place for you. You inspire me. Being your father is my greatest joy and the crowning achievement of my entire life. Thank you for your patience and belief.

A sincere thank you for my parents, Dr. Isabel Rodriguez-Dehmer and Mr. Richard Dehmer, I love you both so much. Thank you, mom, for your fierce support and unwavering insistence that the stars are mine to reach and conquer. Your doctoral journey was a definite inspiration. To my pop, thank you for always being that steadfast Godly father figure in my life; your wisdom and love has been a true gift for which I will always be grateful. To my father in heaven, Hiram Rodriguez, may you smile down with pride as I chase down goals and dreams, the desire of every father the first time he holds his son.

I would also like to thank two people who have been beacons of kindness, love and generosity, my grandparents, Raymond and Carmen Cintron. Grandma, you kept me fed in this life both physically and spiritually with your amazing food, endless smiles and infectious laughter, and a fierce unconditional love. You cared for me like I was a priceless gift. Your impact and memory are as strong today as it ever was, thank you, I love you. To grandpa, I simply say thank you for your unwavering love and support. From our shared cinematic love and appreciation for the Three Stooges, to your quiet reassuring smiles, entertaining stories and strong embraces, some of my best childhood memories are those I have shared with you.

I would like to thank my godfather, Idal Pazos. From before I could walk or speak you have been a kind and loyal friend, cheering me on loudly, even from afar, and always believing I would do great things in this life. Thank you so much for always being there

and helping to keep my father's memory alive. To my little "big" brother, Joseph Dehmer, I am so proud of you and appreciate the energetic fervor that you apply to everything, including your love and encouragement. I am so thankful God gave me you, even 18 years into my life. You are my brother but have grown into a true friend and I love you. To Fernando and Evelyn Lopez, thank you for always being unwavering sources of support and love. You have watched me grow and given me the kindest, most sincere words and hugs every step of the way. Your belief in me and constant prayers have truly impacted my life, I love you both very much.

I would like to thank my father and mother in-law, Gary and Judy Plant. Sarah is an extension of the unwavering love and support you so generously give day in and day out. Thank you both for your excitement at the prospect and realization of any and all of my milestones! You have treated me like a son and I could not be happier with any semblance of pride I make you feel. I love you guys so much.

Last and most certainly not least, I would like to thank God. I have felt the impact and movement of God's hand on my life since I was a child guiding my decisions and opening doors that would have otherwise remained closed. Much of this journey requires individual grit and tenacity; however, there is an element of providence that must be acknowledged. Thank you for your faithfulness and peace granted to me in the quiet moments of this quest. Though I was discouraged, though I may have been dismayed, you were faithful to your promise and were with me every step of the way, Joshua 1:9.

Table of Contents

List of Tables

List of Figures

Chapter 1: Introduction to the Study

Introduction

Although the damaging nature of child pornography is not a divisive issue, there is a lack of agreement on how best to address, punish, or rehabilitate child pornography offenders because several forms of federal child pornography crimes exist. In this study, I examined two crimes—possession of child pornography and receipt of child pornography—and the difference in recidivism for first-time offenders charged with each. The legal difference between the two crimes is that possession indicates the offender knowingly possessed an image or video that the offender believed to be a real child and receipt is the same except the offender "knowingly received" (Doyle, 2013).

Child pornography offenses are on the rise (Armstrong & Mellor, 2016; Kuhle et al., 2017; Seto & Eke, 2015; Steele, 2015), so the U.S. Congress has approved set guidelines and mandatory sentences to address the increase in child pornography. Additionally, federal circuit courts have received evidence establishing a relationship between child pornography and child molestation (Pisegna, 2016), which merit greater attention and efforts on child protection. Although this quantitative study will not reveal the cause of federal child pornographer's recidivism, it can provide information about the relationship between sentence experience, recidivism, and the factors that may predict reoffending. This addresses a lack of research on federal sentencing, child pornography offenders, and recidivism. There also needs to be a better review of sentencing efficacy and child pornographer recidivism predictability to mitigate child exploitation.

In addressing a gap in knowledge, this study may lead to policy modifications. For example, there are unanswered questions regarding federal sentence experience and its effectiveness in reducing recidivism in child pornographer recidivism. The two crimes are so similar that some offenders are charged with one or both based primarily on prosecutorial discretion. Yet the difference in sentence experience can be as long as a 5-year incarceration. Thus, this study can provide better understanding and subsequent efforts for positive social change.

Background

Retributivism demands justice such as a mandatory-minimum sentence, yet a possession charge may yield a term of probation. Thus, it is important to examine the sentence experience or even the type of charge and any effect these have on recidivism. Research has shown that post-conviction programs aimed at recidivism reduction for child pornographer offenders were found to not only be ineffective but somewhat associated with increased recidivism rates (Cohen, Cook, & Lowenkamp, 2016). Further, Cohen and Spidell (2016) found that the recidivism rate for federal child pornography offenders with no physical sexual abuse admissions was nearly the same as those who committed child sexual abuse. By definition, child pornographers victimize children through the perpetuation of demand for material depicting the sexual exploitation of children, whereas contact or physical sexual abuse is the direct victimization of a child. Yet recidivism rates between the two groups are highly similar, which leads to concerns regarding the efficacy of mandatory-minimum sentences. Moreover, there has been a

shift toward sentencing factors that deal more with the policies and less with the offender (O'Hear, 2006).

Going beyond the efficacy of federal sentencing, the literature is lacking on the nature of child pornography offenders despite the ample information about sex offenders in general. For instance, Merdian, Thakker, Wilson, and Boer (2013) suggest that a narrow examination of child pornographer typology can yield a better understanding of current offending and future criminogenic tendencies. Seto et al. (2015) also addressed the drawbacks of previous child pornography studies in that child pornographer risk factors have been unexplored. Further, there is a research gap between federal sentencing policies and their impact on child pornography offenses (Wollert, 2012). Therefore, I conducted this study to provide a better understanding on recidivism between two groups of offenders—those convicted of possession of child pornography and those convicted of receipt of child pornography.

Problem Statement

There is significant legal and academic debate as to whether a collector of child pornography should face the same ramifications as a person who commits child sexual abuse. Child pornography is sexual exploitation on a person under the age of 18 years mainly through online technologies, anime depicting fictional characters of children, or textual descriptions of sexual contacts between an adult and a minor (Seto & Eke, 2015). Child pornography is a serious offense in the United States and the federal government has made concerted efforts against the proliferation of child pornography. This is

especially the case regarding the production of contraband via more stringent sentencing guidelines (U.S. Legal, 2015). Production of child pornography carries with it a 15-year federal sentence.

There has been a substantial increase in online sexual offenses despite the Prosecutorial Remedies and Other Tools to End the Exploitation of Children Today Act of 2003 (The PROTECT Act) and the Adam Walsh Child Protection and Safety Act of 2006, which are in place to penalize sexual offenders (Cohen & Spidell, 2016). In addition, the U.S. Department of Justice has initiated several task forces and funded units within federal law enforcement agencies to combat child pornography (Cohen & Spidell, 2016). However, the supply and proliferation of child pornography is increasing. For instance, the number of sex offenders convicted of online child pornography has increased under federal post-conviction supervision by 1,400% since 1994 (Cohen & Spidell, 2016). As with basic economics, the increase is due to the demand, which is attributable to the marked availability, affordability, and utilization of devices in digital space (Cohen & Spidell, 2016; Seto & Eke, 2015; U.S. Legal, 2015). Consequently, there is a continuous increase in the number of post-convictions where offenders are prosecuted for possession, receipt, distribution, and or production of child pornography (Cohen & Spidell, 2016).

Research has documented a relationship between viewing child pornography and sexual abuse such as molestations. One study went as far as to suggest that a child pornography offense is a "stronger indicator of pedophilia" than a physical-sexual

offense against a child (Seto et al., 2015). Likewise, research has found 26.8% of

pedophilic individuals among a group of child sexual abusers (Schmidt, Mokros, & Bane,

2013), which is comparable to over 33% of sampled convicted child molesters who

admitted to self-stimulation while viewing child pornography prior to their hands-on

offense (Seto et al., 2015). In addition, repeated use of child pornography in this fashion

psychologically stabilizes the abuse of children and subsequently diminishes guilt and

inhibitions toward predation (Merdian et al., 2013). Ultimately, experts posit a link

between child pornography and the physical sexual exploitation of children (Seto et al.,

2015). A recent report by the Department of Justice also confirms this relationship

between child pornography and sexual abuse of children (Pisegna, 2016). However, the

courts have differing perspectives on how this relationship impacts the offenders and the

prosecution of the offenders (Pisegna, 2016).

There are federal initiatives and law enforcement that continue to combat child

pornography and child exploitation. Yet post-convictions continue to increase due to free

access to online resources. Therefore, there is a need for further investigation to

understand the rate of recidivism among child pornography offenders, which constitutes

the purpose for conducting this study.

Purpose

The purpose of this quantitative study was to compare recidivism in federal child

pornography offenders given two different sentences—mandatory-minimum (5-year'

incarceration) or probation—and to examine which sentence yields a lower recidivism

rate. Additionally, I examined several factors as potential predictors of recidivism: crime of conviction, age, race, time on supervised release. I divided the federal child pornography offenders into two groups based on sentence: those sentenced to a mandatory-minimum term of 5 years' incarceration and those given probation and no incarceration. For the second analysis I divided the groups by crime of conviction rather than sentence. Examining the statistical relationships among the recidivism rates for these two groups as well as potential predictive values may encourage better policy to help offenders readjust into society (Grossi, 2017). Therefore, this study will help to address the gaps in the literature regarding sentence effectiveness and recidivism predicting.

Research Questions and Hypotheses

Research Question 1: Is there a difference in recidivism between federally convicted child pornography offenders exposed to a mandatory-minimum sentence (Group A) and those federally convicted child pornography offenders expose to a term of probation (Group B)?

H_1 1: The likelihood of recidivism for Groups A and B are significantly different.

$H_0$1: The likelihood of recidivism for Groups A and B are not significantly different.

Research Question 2: To what extent does federal conviction of possession of child pornography, federal conviction of receipt of child pornography, age, race, and time on supervised release (1 to 5 years, 6 to 10 years, 11 to 20 years, and 21 to 99 years) offer a measure of predictability for the likelihood of recidivism?

H_1 2: Federal conviction of possession of child pornography, federal conviction of receipt of child pornography, age, race, and time on supervised release (1 to 5 years, 6 to 10 years, 11 to 20 years, and 21 to 99 years) offer a measure of predictability for projecting the likelihood of recidivism.

$H_0$2: Federal conviction of possession of child pornography, federal conviction of receipt of child pornography, age, race, and time on supervised release (1 to 5 years, 6 to 10 years, 11 to 20 years, and 21 to 99 years) do not offer a measure of predictability for projecting the likelihood of recidivism.

The independent variable for Research Questions 1 is federal sentence (probation and mandatory-minimum incarceration). The dependent variable for Research Questions 1 and 2 is the likelihood of recidivism. The independent variables for Research Question 2 are specific federal crime of conviction (possession of child pornography and receipt of child pornography), age, race, and time on supervised release (1 to 5 years, 6 to 10 years, 11 to 20 years, and 21 to 99 years).

I examined the possibility of a significant difference between recidivism in Groups A and B. To do so, I compared them via a Chi-square test of independence. This will compare the frequency rate of recidivism between the two groups. I used a binary logistic regression analysis to assess the levels of predictability between Groups A and B recidivism rates and additional variables in Research Question 2.

Theoretical Framework

The theoretical basis for this study is retributive justice theory (Holtman, 2011) and the self-regulation model (SRM; Wad & Hudson, 1998). The U.S. Congressional premise for mandatory-minimum sentences is to provide an appropriate penalty. This is the basic principle of retributive justice, which maintains that the optimal response to crime is a proportionate punishment (Berman, 2011). The concept of retributive justice predates civilization; although *lex talionis* (law of retaliation) is commonly associated with Roman judicial codices, the basic premise can be found in early biblical and Babylonian texts (Fish, 2008). The functional concept of retributive penalties frame the structure by which current federal child pornographers have been and continue to be sentenced. Central to retributivist theory is the notion that there is an intrinsic value to the suffering of wrongdoers (Tadros, 2011). Thus, a statistical understanding of the impact mandatory-minimum sentences has on the population of this study might illuminate the effectiveness of this theory.

Both groups in this study have numerous things in common such as child pornography, sex offending, computer skills, and federal offending; however, the main commonality is that they both received an opportunity for post-conviction reentry back into society. Ward and Hudson's (1998) SRM addresses the cyclical nature of sex offenders in relation to self-regulation and positive mood states. In short, offenders will take steps to avoid what repeats offending cycles, but often do so by satisfying an internal compulsion. This little yet instant gratification becomes decreasingly effective, which

leads to cyclical behavior. This provides a solid foundation for understanding the nature of recidivism despite interventions such as federal convictions or incarceration.

Nature of the Study

The nature of this quantitative study was to ascertain the statistical occurrence of the differences between the recidivism rates of two groups, thereby gaining a more accurate understanding regarding the impact of mandatory-minimum sentences on federal child pornographer recidivism. To explore this relationship, I chose a quantitative approach, which allowed me to determine whether there is a statistical significance between child pornography offenders who are incarcerated and those sentenced to probation. Quantitative methodology is central to the exploration of covariation via the acquisition and analysis of quantifiable data (O'Sullivan, Rassel, & Berner, 2016; Patten & Bruce, 2007). In quantitative research, to determine what variables are central to answering the questions and hypothesis, the researcher must examine the relationships between and among variables (Creswell & Creswell, 2017). Primarily, I sought to reveal the nature of the relationship between the variables and the likelihood of recidivism. I studied this through numeric data that will assist in a better understanding of the research problem (McNabb, 2002). Given the nature of the research purpose, and the data available, a quantitative design is a logical choice to accomplish the overall goal.

The research questions are concerned with two key and possibly related aspects— the difference in recidivism between those incarcerated via mandatory-minimum sentences, Group A, and those given probation, Group B. For instance, similar or higher

rates of recidivism would reveal something about mandatory-minimum sentences. The research questions both address recidivism as they pertain to federal child pornography offenders. Given that recidivism is a binary result, and it is a numeric value, I quantitative method of observation was the most appropriate method to answer the research questions (Creswell & Creswell, 2017). I acquired the data for a set of federal child pornography offenders and observed to answer the research questions. Although each offender may have prior criminal offenses, I did not account for past sex offenses. Specific to federal statutory penalty ranges, 5-year and probationary sentences are reserved for first time child pornography offenders only; those with prior sex convictions automatically have 10 years' incarceration added to their sentence (U.S. Sentencing Commission [USSC], 2012).

The recidivism occurrences provided the necessary data to understand better the covariation relative to the sentence. However, the participants were not randomly assigned for this study. Therefore, a correlational research design was used to capture the data in its natural element (Trochim, Donnelly, & Arora, 2015). Regarding the alignment, the research questions drove the methodology, the nonrandom nature of the quantitative method drove the design, and the correlational design is consistent with the research aims of the original questions.

Definitions

This study will contain terms than can have meanings that are interchangeable, such as recidivate and reoffend. Other terms can be construed as industry or criminal justice specific. The definitions for this study are as follows.

Child pornography: Any visual depiction of sexually explicit conduct involving a minor (persons less than 18 years old). Images of child pornography are also referred to as child sexual abuse images. Additionally, this refers to child sexual exploitation.

Child pornography offender: For this study, a person that knowingly possesses or receives child pornography. Although federal law also prohibits the production, distribution, and importation of child pornography, these activities and offenders are not the focus of this study.

Federal judicial system: The laws, courts, and jurisdiction strictly regulated by the federal government.

Incarceration or imprisonment: Post-conviction punishment where the offender is required to spend time segregated from society for a set duration.

Probation: For this study, probation is post-conviction sentence where the federally convicted child pornography offender is monitored and treated without any incarceration.

Mandatory-minimum sentence: A federal mandate by statute that limits the discretion of sentencing judges by requiring sentences of imprisonment for a "not less than" designated period. For this study, the federal crime of receipt of child pornography

carries with it a 5-year mandatory-minimum sentence. Therefore, the sentencing judge of an offender convicted of this crime must impose a sentence of imprisonment not less than 5 years.

Recidivism: For this study, recidivism is a conviction for any subsequent sexual offense for which the conviction would require the offender to register as a sex offender had the first offense not taken place.

Sentencing: The judicial phase where the presiding federal judge imposes the offender's punishment

Sex offense: Any criminal act that would require registration as a sexual offender subsequent to a conviction for said crime.

Sex offender: For this study, a sex offender is a person over the age of 18 that has been convicted of a sexual offense in any jurisdiction for which they are required to register as a sex offender.

Time on supervised release: The period a federal convicted child pornographer is required to be monitored, also the same amount of time the offender is on federal probation.

Assumptions

The initial assumption for the data used in this study is that it accurately reflects and chronicles the judicial events examined such as convictions, sentences, demographics and periods on supervised release. Although this cannot be proven true, the countless examinations of the information contained in these records by the offenders themselves,

their defense attorneys, federal prosecutors, and presiding judges lends value to the accuracy of said records. The assumption that this archival data are accurate sets for the parameters by which a quantified analysis can be made do reveal the true nature of the relationship between variables.

Scope and Delimitations

To examine the likelihood of recidivism in federal child pornography groups defined in this study, I used a quantitative methodology. The initial research question is aimed at comparing two groups by sentence experience and determining if one sentence is more effective in recidivism reduction. The second research question for this study is a correlational analysis of several variables and factors that may provide predictive value in terms of predicting recidivism in federally convicted child pornography offenders. The scope of this study consists of offenders who have only one sexual offense, a federally convicted sexual offense. This was done to establish a baseline to remove the need to account for a mediating effect of previous criminal history related to sexual offenses. Data were limited to secondary data for federal convicted child pornography offenders to include judgement and commitment orders, sentencing records, and publicly available information on sex offender registries. In accordance with Walden University Institutional Review Board (IRB), identifying information and characteristics were removed from each record prior to analysis.

Limitations

One cautionary limitation when making analytical use of archival data is the lack of control the researcher has over the method of data collection (Barnes, Dang, Leavitt, Guarana, & Uhlmann, 2015). However, these data are compiled with the full knowledge and review of each offender. The data collection method includes multiple examination by individuals closely related to the criminal case as well as each offender at many stages throughout the criminal proceedings. An empirical study of federal court records found that apart from slight variations in sensitive information such as financial and health information, federal criminal records were found to be accurate even more so that civil proceedings (Ardia & Klinefelter, 2015). Because I used nonexperimental methods and was unable to control for ancillary factors that may have some influence on the dependent variable, which is the likelihood of recidivism, this study does not have a claim to establish a cause and effect relationship among the variables.

Significance

One of the founding tenets of the federal prison system is rehabilitation. Therefore, a mandated exposure period should reduce the probability of reoffending if not reduce the rate altogether. However, federal sentences may not be preventing recidivism, at least as it relates to federal child pornography offenders and recidivism. Recidivism studies have shown the lack of recidivism reduction from prison. For example, Cullen, Jonson, and Nagin (2011) concluded that prison has a marginal effect

on recidivism reduction and even stronger evidence to suggest that it has a "criminogenic effect" (p. 48S). Thus, prisons may be making matters worse.

In the case of this study, recidivism is important to examine in child pornography offenders because their offenses lead to the sexual exploitation of children and the propensity for hands-on sexual abuse (Cullen et al., 2011). Therefore, this study has social change implications for less danger for children worldwide and a reduced economic drain. Moreover, this study has net benefits that is comprised of tangible benefits, intangible benefits, and program cost (Donato, Shanahan, & Higgins, 1999). The tangible benefits of this study, resulting from more discussions on prison reduction and treatment increase, are a significant annual savings of offender incarceration costs as well as housing space. The intangible benefits are the positive social effect on children. Lastly, the program cost would be covered by the tangible benefits savings from term reductions.

My study can also provide new knowledge to the community of federal sentencing policymakers, which may change their attitude toward the status quo (Jacobs & Weaver, 2015). Moreover, the change would come as a result of evidence-based research on recidivism and collaborative efforts between those involved in federal sentencing decisions, and sex offender treatment facilitators. The implication of applying the results of my study to future assessments of existing federal sentencing policies includes additional conversations concerning the merits of correctional philosophies such as incapacitation and rehabilitation. The first step in examining the effectiveness of

mandatory-minimums is to assess the recidivism rates. If these rates are consistently rising and failing to meet post-release expectations, then an alternative must be sought. Given the amount of money required to house each offender for 5 years, approximately $120,000 (Bureau of Prisons, 2012), a sentence reduction by 3 years could cover the cost of a high-quality treatment program. If managed correctly, the newly reallocated financial resources might even have enough surplus to invest further in crime prevention programs.

Overall, the results of my study may have significant implications for policy changes in federal sentencing, particularly as they pertain to a specific group, child pornography offenders. Criminogenic typology of the offenders examined preclude generalization to other groups such as drug dealers, terrorists, and white-collar criminals. Although recidivism is not crime specific, the strategies to reduce it are.

Summary

Chapter 1 offered a brief summary of the purpose of this study. In this study, I examined federal child pornographer recidivism and the relationship with sentence experience as well as potential measures for predictability. I examined the problem from a retributivist perspective as well as from a SRM. The two initial independent variables are mandatory-minimum sentence and probation. These were examined to assess their relationship with recidivism occurrence. The five subsequent predictor variables are associated with each offender and were analyzed to understand better the potential value in terms of recidivism predictability. The dependent variable for both research questions was the binary outcome—recidivism or no recidivism. I used secondary or archival data,

analyzing it with a Chi-square test of significance and binary logistic regression. The secondary data were collected from three different sources, filtered conviction records provided by the U.S. Attorney's Office, Public Access to Court Electronic Records (PACER), and the national sex offender registry. This study may provide information that can encourage policy changes that can lead to more efficient punishment of offenders, which can protect more children.

The second chapter provides an exhaustive review of relevant literature and the underlying framework for this study. Moreover, a rationale for this study and the variables will be discussed. Thereafter, Chapter 3 will include the chosen methodology, data collection, justification, and analytical procedures for this study.

Chapter 2: Literature Review

Introduction

Though federal sentencing, the typology of child pornography offenders, and recidivism have been explored independently both academically and politically, there is a lack of research on the interaction of these factors. Further, literature suggests that the penalties are disproportionate and do not achieve the original mandates of the U.S. federal correctional system. A common notion that is misaligned with Congress' original intent on effecting social change is mandatory-minimum sentences. In several ways, literature has not addressed the relationship between federal sentencing and child pornographer recidivism, especially regarding whether federal child pornography sentencing policies have efficacy. Thus, I conducted a quantitative examination of data on federal sentencing, child pornography, and sex offender recidivism, which can provide evidence-based guidance on the impact and effectiveness of mandatory-minimum sentences on federal child pornography offenders.

Although there is minimal information about the impact of federal sentencing on child pornographer recidivism, there was an abundance of information related to federal sentencing. Given that sentencing policies are set forth by Congress, based on research provided by the USSC, there are varying legal, political, and scholarly opinions. Kim, Spohnextant, and Hedberg (2015) refer to federal sentencing as a complicated and collaborative process between judges and prosecutors, and this often leads to disparities. To understand these disparities and why they matter in child pornographer sentencing, it

is important to look at the origins of federal sentencing, especially mandatory-minimum sentences. Literature suggests that federal sentencing has two primary goals: crime control and fair or just punishment. However, what is considered just can fluctuate over time given the nature of social norms, political policy priorities, and continued understanding of the crime itself. Federal sentencing guidelines were established in 1987 and are nonbinding rules that maintain a uniform sentencing system for federally convicted offenders. Yet, these guidelines have been under scrutiny such as in *United States v. Booker*. In this case, the Supreme Court found that the mandatory guidelines were unconstitutional and should be considered only advisory. However, mandatory-minimum sentences still exist and establish a binding minimum sentence for each crime despite a judge's compulsion to reduce the sentence. In fact, the primary purpose of mandatory-minimum sentences was to reduce or remove disproportionate judicial discretion that can undermine the uniformity in federal sentencing.

Although researchers have focused on one or maybe two of the three main issues in this study, there is a lack of research that affects conclusions concerning policy or sentencing reform. Many studies address the failures or inadequacies of federal sentencing. Other studies address recidivism on sex offending but not on child pornography recidivism. The following literature review was conducted to examine issues of recidivism and mandatory minimum sentences. Also covered are the traditional elements of the relevant theorists and theories, which provide the theoretical framework and support the need for this study.

Literature Search Strategy

The objective of the literature review was to examine relevant research that address child pornographer recidivism, federal sentencing, and the relationship between the two. There is ample information about federal sentencing, child pornographers, and recidivism. Research and assessments of each of those areas have been documented via several disciplines such as legal, political, policy, psychology, criminal justice, and academic. As such, multidisciplinary databases associated with various fields of study were used to search for relevant literature.

Peer-reviewed journals were identified by database searches through Walden University Library and Miami-Dade College Library resources. The databases used are ProQuest, Google Scholar, ICPSR - Inter-University Consortium for Political and Social Research Datasets, LegalTrac, SAGE Journals, EBSCOhost. Although several resources were leveraged to attain the scholarly research necessary for this study, the Walden University Internet-based library was the primary tool used. The Walden University Library was a useful resource given its vast inventory that crosses nearly every geographical boundary and academic disciplines. Specific to this study, searches included the key terms *federal sentencing*, *child pornographer recidivism*, *sex offender*, *mandatory-minimum sentences*, *federal offender recidivism*, *retributivism*, *self-regulation model*, *child exploitation offender*, *child pornographer typology*, *sentencing guidelines*, and *trends*.

A review of literature related to the key words found in my topic yielded references to other studies that were related provided additional information on how best to frame my topic. I then began collecting full-text articles for further review and comparison to past research to determine what if any advances in conclusions have been made regarding child pornographer recidivism as it relates to federal sentencing experience. An exhaustive review of the literature led to the identification and selection of the independent variables used in this study.

Theoretical Foundation

The bi-fold issue of FMM sentences and federal child pornographer offenders present is whether current sentencing policies reduce recidivism and whether the 5-year mandatory-minimum sentence for receiving and distributing child pornography helps prevent further child exploitation. Addressing these issues requires a baseline understanding of mandatory-minimum sentences and child pornography offenders, especially those committing the federal crimes related to child pornography. The literature provides various ideas and dominant theories related to federal sentencing as well as sex offenders as it pertains to child pornography and their tendency to recidivate or commit child sexual abuse. The following literature review also shows the efficacy of policies as they relate to retributivism and the SRM. Lastly, this literature review demonstrates the significant gap in research and conclusive or evidenced-based data on the effectiveness of mandatory-minimums on the rehabilitation and recidivism rates of federal child exploitation offenders.

Retributivism

Retributivist theory or retributivism is at its core a punishment theory. Based on the theory, wrongdoers deserve punishment that is proportional to their crime, which helps satisfies justice. Although a possible oversimplification, this criminal justice philosophy is moral in that it focuses on what is "right" and "just." Retributivism is the only punishment theory that does not rationalize or allow for the punishment of innocents in pursuit of a greater good; it does not exploit people as a means to an end; it provides a delineated account of the necessary level of punishment; and it maintains that only individuals who possess moral culpability receive just punishment (Christopher, 2002). Berman (2011) attributes the strength of retributivism to two key questions: "What do wrongdoers deserve?" and "What is the meaning of the word 'deserve'?" Answers to these questions align retributivism to the criminal justice needs of the day. Sentencing standards and litigious decisions are always changing in terms of punishment.

Retributive justice theory dates to the days of the Norman Conquest when servants pledged allegiance to the lord of the land, establishing the concept of wrongdoings or crimes against the state not a person (Meyer, 2017). The concept was that every action impacts the community. However, pure retributivism demands that the proportion is measured against the crime committed, not the offense almost committed. For example, whether a person attempts to steal but is caught in the act or successfully commits the theft. Some interpretations of the theory would suggest that these offenders should not receive the same sentence, which has deterrent value. However, ardent

retributivists argue that wrongdoers are better punished despite zero deterrent effect; the person deserves a consequence because of an action he or she chose. When it comes to federal child exploitation offenders, the person, the consequence, and basis for the consequence are factored in defense of mandatory-minimum sentences. In this case, justice does not consider the background, race, age, intellect of the person who committed a qualifying crime. The consequence, in the case of this study, is a 5-year mandatory-minimum sentence or a sentence of probation. Lastly, the predicate actions that trigger consequences are examined for factors that may extend the consequence or support the view that the base consequence is sufficient. For example, Immanuel Kant, a supporter of retributivism, stated that a crime committed should always result in the infliction of punishment on the offender merely because of the offense (as cited in Primoratz, 1990). This summarizes the philosophical function and purpose of retributivism or punishment theory. However, retributivism is also about balance or the use of two wrongs to restore a right, as punishment can be considered force or coercion much like a crime can (Hegel, as cited in James, 2017)

Another issue is efficacy in prevention or enforcement. Mandatory-minimum sentences were founded on principles of retributivism, yet recidivism reduction is further accomplished by deterrent efforts (Lowe, 2016). This is significant considering that deterrence theory is sometimes referred to as the opposite of retributive justice theory. The premise of federal sentencing guidelines is to promote respect for the law via an appropriate punishment for the offense, provide adequate deterrence against future

conduct, protect the public from additional harm by an offender, and provide the offender with necessary educational training, medical, or correctional treatment (Hunt & Dumville, 2016). Because the aims of just punishment and deterrence present conflict, there are debates on the efficacy, or lack thereof, regarding mandatory-minimums.

Although the debate over this theory and the efficacy of others in the realm of criminal justice has persisted among lawmakers and scholars for centuries, events in American jurisprudence have cemented the supremacy of retributivism. For example, the Supreme Court of the United States went on record in *Spaziano v. Florida* (1984) to say that retributivism is the "primary justification for the death penalty" (p. 32). This was a powerful endorsement for what is still currently a contentious topic. Again, there must be some perceived value in the punishment, even fatal punishment, for such a level of punishment to be sought.

This study adds to the existing foundations of retributivism. The fact that that retributivism is a cornerstone of federal sentencing is well established in mandatory-minimum sentences. The mandatory-minimum sentences for child exploitation offenses can be very high, and in the opinion of many federal judges, quite severe. Although just punishment is one of the chief goals of federal sentencing, accomplishing this purpose does not mean that the federal child pornography offenders will not reoffend. Thus, a review of the retributivist goal and its corresponding measures may be necessary. There needs to be an adjustment to account for the potential failure of the federal criminal justice system in preventing future child exploitation offenses by previously convicted

federal child pornography offenders. The acquisition and quantitative examination of recidivism rates among probationers versus mandatory-minimum offenders can reveal whether retributivist goals that drive mandatory-minimums help prevent future crime or just satisfy an immediate need for punishment.

Self-Regulation Model

A review of retributivism is the first half of considering justice. After receiving punishment, it is hoped that offenders have learned their lesson and transition back into society; however, there is recidivism, relapse, and reoffending. Therefore, the SRM can be used to examine not only what happens after punishment but also what the person does. The person has little to no control over what their sentence will be, but they do have control over how they respond. Researchers have examined for years why, sex offenders relapse or act out in specific ways. Ward and Hudson (1998) initially proposed the SRM around 1998 to account for the failure of sex offender prevention programs. This is a nine-stage process to examine nearly every facet of the offender's post-punishment response. Before SRM, it was commonplace for correctional institutions to employ the use of relapse prevention programs that relied on self-control measures derived from social learning theory, which has been used for years to treat narcotics addiction. Nevertheless, as with sentencing, inmate housing, and other areas, researchers have discovered that dealing with sex offenders requires a unique approach. Studies have shown that certain prevention models are not applicable to sex offenders, as the dynamics of sexual offending do not typically follow the same spectrum as other addictions (Ward

& Hudson, 1998; Yates, Kingston, & Hall, 2003; Yates & Kingston, 2006). The

maladaptive application and failure of relapse prevention programs that spurned the

creation, use, and success of SRM (Ward & Hudson, 1998; Ward, Louden, Hudson, &

Marshall, 1995).

The SRM process examines the offenders' success in achieving goals as well as

pitfalls, their active or passive role, all resulting in four pathways that are hypothesized to

lead back to sexual offending. Research has found SRM to be both valid and helpful in

determining risk and recidivate predilection among previously convicted offenders (Yates

& Kingston, 2006). At its core, SRM is a decision-making process coupled with set goals

that direct "action through the control and integration of cognition, affect, and behavior"

(Yates, Prescott, & Ward, 2010, p. 4). SRM is, therefore, more appropriate in the

treatment and development of sexual offenders, given the heterogeneity and often

unyielding desire to offend sexually. For instance, the term *sex offender* is used to capture

the array of proclivities and actions of a parson. An individual may be convicted of

sexual assault but still find satisfaction in the sexual offense of child pornography to be

the less conspicuous option.

As previously discussed, there are four key pathways to the SRM. The first is the

avoidant-passive pathway. This is the internal process the offender undertakes to inhibit

the innate desire to commit a sexual offense; this internal process is, however,

insufficient to curtail such desire due to disinhibition or under-regulation. Simply stated,

these individuals just attempt to avoid the action with little to no control over the internal

desire or urge for which the struggle is predicated. Moreover, the individual who has gone down this pathway does not possess the necessary cognitive contingency tools to deal with their preference. In the realm of child pornography offenders, this is very common, as seeking out such contraband is the lowest form of avoidance. Such a person lacks the rudimentary skills and desire to keep from reoffending. Moreover, this curiosity is spurned by an attraction that perhaps has never been fully explored or understood by the offender. From the early 80s, this singular pathway was thought to be the one-size-fits-all approach to relapse prevention. However, sexual offenders have a varied assortment of approaches and motivations. Nevertheless, the SRM has been shown to be a valid and successful approach despite these variances (Bickley & Beech, 2002; Proulx, Perreault, & Ouimet, 1999; Webster, 2005; Ward et al., 1995; Yates et al., 2003).

The second pathway is the avoidant-active pathway. Similar to the previous one, this pathway describes an offender that has at least an elevated desire or active approach to avoiding additional sex offenses. Nevertheless, this person is no more successful at avoidance due to the employment of insufficient and more importantly, ineffective prevention strategies. Impulse or situational advantage often causes this offender to reoffend.

The third pathway is the approach-automatic pathway. This is characterized by what has been described as well-entrenched behavioral and cognitive schema. In short, the offender's success or failure is situational. Further, the exposure to opportune scenarios for offending make planning or intention irrelevant. As such, people with

conditions of pedophilia, hebephilia, and ephebophilia will falter, according to this pathway. Avoiding such scenarios becomes immeasurably tricky when a person's predisposition is to act upon these conditions through the visual depiction of the appropriate child or age and gender.

The final pathway is the approach-explicit pathway. This is thought to be the opposite of the aforementioned approach. This type of offender takes well-maneuvered steps to ensure access or success. This person is characterized by long-standing developmental experiences that endorse and rationalize sexual aggression. Ironically, this person is said to have substantive self-regulation abilities given that will relinquish opportune scenarios for a more predetermined perfect situation.

One study revealed that incest offenders are prone to avoidant-passive pathways, again, the lowest form of self-regulation. Rapists, however, were found to exhibit behaviors and coping strategies consistent with avoidance-automatic and avoidance-explicit. This accounts for base sexual aggression for which is there is no satisfaction until the first opportunity, as well as hostility, has to be satisfied with premeditated precision. As with other places in this study, a gap exists about research and conclusions for SRM and child pornography offenders. However, given that they have been legally and formally characterized as sexual offenders, the recidivate coping weaknesses will be evident in one of the previously described pathways. While this study is not the place for speculation, child pornography offenders often confess to destroying their files, folders, and even their hardware to purge and avoid, and further contact, only to reacquire new

devices and access to satiate their natural impulse. Thus, this emulates highly the characteristics of avoidance-active pathways for which measures are taken, just to fail because the steps merely deal with the symptom, and not the problem.

Literature on the Three Main Parts of the Study

Federal Sentencing

Ratcliffe (2015) posits that sentencing courts should place more emphasis on child pornography offenders rather than the child pornography offenses. While this is legally problematic because the offenses themselves are standardized and at the point of sentencing, the offenders either have pled guilty or have been convicted of the same crime, regardless of their personal history. Nevertheless, rehabilitation and recidivism avoidance are a unique journey. However, mandatory-minimums do apply a one-size-fits-all approach. As such, this raises two areas of concern: Are mandatory-minimum sentences working regarding recidivism prevention for federal child pornography offenders? Moreover, what is the recidivism prevention impact of mandatory-minimum sentences compared to those given probation?

As one author writes, the existing federal sentencing system was birthed in one era and delivered in another. Tonry (2015) points out that the original intent of the Sentencing Reform Act of 1984 was to strike at the heart of disparate and inequitable indeterminate sentencing. Theoretically speaking, this created a paradox for which we now have to reconcile. In a time of severe and consistent downward departures on the part of federal judges, notwithstanding a general outcry for child pornography sentence

reduction, a homogenous application of justice conflicts with retributivist roots which demands that justice be calibrated to individual culpability. This harkens back to Ratcliffe's point that sentencing should be more focused on the offender rather than the offense. One might argue that the presiding or sentencing judge has the opportunity to take such individual factors into account during the application of the sentencing guidelines, which after all, are merely after *United States v. Booker* advisory. Regardless, a sentencing system that attempts to account for every possible aspect or relevant factor of offense severity and culpability would be impossible to implement. Even still, such a system would remove the mystery of potentially increased punishment and therefore nullify any viable deterrent effect (USSC, 2015). Even the sentencing commission concedes in their opening remarks of the Sentencing Guidelines manual that they are evolutionary and that there is an inherent expectation that continued research should result in revisions if not substantial modifications via Congressional amendments.

The central critique of mandatory-minimum sentences in recent literature is its inherent severity. Federal incarceration on its own is considered severe, a factor in sentences that regardless of any mitigating circumstances prescribe a pre-set term of imprisonment, then the severity is viewed as excess. Justice Anthony Kennedy stated, "our resources are misspent, our punishments too severe, our sentences too long" (Asim, 2004, para. 4). Although Cassell (2004) maintains that mandatory-minimums are redundant, he also qualifies this assertion with the caveat that any conclusion or criticism, as relates to sentencing harshness, should be measure against the goals the sentences are

meant to achieve. In the case of child pornography offenses, Congress has historically

and consistently expressed satisfaction with the increase in penalties in child pornography

cases, particularly with the goal of reducing the possibility of downward departure by

sentencing judges that do not necessarily agree with set guidelines. In fact, when

Congress implemented the five-year mandatory-minimum for receipt of child

pornography in 2003, the USSC recognized their distinct intent to punish the offender. In

a statement from Senator Orin Hatch, he summed up the 2003 bill that modified child

pornography sentences as being the culmination of hard work to protect children. Yet the

question remains, does an increase in punishment protect children from child

pornography crimes, moreover and specific to this study, child pornography recidivism?

To answer such a query would be like picking a consequentialist flower from a

retributivist garden.

A 1996 study by the National Institute of Justice, focused merely on the cost of

crime, about victims, and additional social costs as a result of fear. The costs were

divided into intangible and tangible losses. The results were given for a variety of crimes,

specific to sex offense. They concluded that the total loss per victim was approximately

$99,000, roughly $9,500 for tangible damages and $89,000 for loss of quality of life and

intangible losses (Miller, Cohen, & Wiersema, 1996). When one considers the number of

children that have been sexually exploited for visual depictions the amount of aggregate

loss is staggering.

The point of relevant literature on the subject is not that federal child exploitation offenders should be punished: it is about how effective, or ineffective, current policies are in achieving the goals for which they were established. A common theme among legal and scholarly work on child pornographer sentencing is that the use of mandatory-minimums is redundant, unwise, unfair, and unnecessary. Congress began implementation of mandatory-minimums before Federal Guidelines were adopted. Now that the Guidelines exist, they capture numerous facets and factors of the offender's life and activity to provide the sentencing judge the most appropriate punishment for his crime. However, mandatory-minimum can and often do exceed what the Guidelines would prescribe. Even the USSC has urged Congress to reconsider mandatory-minimums. Mandatory-minimums were and continue to be quite helpful and persuading offenders facing lengthy mandatory-minimums to divulge critical pieces of information for a reduced sentence via conviction of a different (non-mandatory-minimum) offense. This is entirely appropriate for narcotics cases; however, for child exploitation offenses, there does not exist the same yield or leverage. Moreover, if a federal prosecutor attempted to strong arm a defendant by merely relying on the Guidelines themselves, this would be conjecture at best considering existence of severe sentencing disparity among judicial districts and offenses.

The crux of the federal sentencing factor in this study is inconsistency. In this study, there are only two federal charges being considered, possession of child pornography, and receipt and or distribution of child pornography. It has been previously

stated that possession of child pornography often results in the offender receiving

probation. While this is true, the guidelines provide sentencing judges the ability to

incarcerate a person for up to ten years for a mere possession charge. However, given that

there is no mandatory-minimum sentence for possession, judges can and often do settle

for probation, even if guidelines suggest a harsher sentence should be administered. Lowe

(2016) posits that such deviation is not only typical, but such inconsistent application has

rendered existing non-production child pornography guidelines useless in furthering the

core principles of retributivism. This is in stark contrast to the charge of receipt and or

possession of child pornography, another non-production charge. The term non-

production refers to child pornography charges whereupon the offender was not involved

in the creation or production of the child exploitation media. Such a charge carries with it

a more severe 15-year mandatory-minimum sentence. Nevertheless, receipt and

distribution charges are often used and sought after by federal prosecutors because of the

leverage value they contain. If a person regardless of what kind of strict or lenient judge

they get will be facing five-years of incarceration, they are inevitably more likely to not

only plea to a lesser charge but provide and proffer information of investigative value.

Also crucial to this issue is the offender himself. Mandatory-minimums do not

distinguish between an offender that has distributed 50 videos and an offender that has

distributed 500. Realistically, higher child exploitation media collections garner higher

sentences, but that is not always the case. While guidelines account for such mitigating

and aggravating factors as collection size, mandatory-minimums do not. This means that

two people with vast differences in culpability and length of involvement will and often

do get the same sentence. Therefore, are mandatory-minimums furthering justice, or

creating more problems by increasing the number of sex offenders that are eventually

released into the community? The number of sex offenders prosecuted and released into

post-conviction federal supervision has grown well over 1,000 percent since 1994 (Faust

& Motivans, 2015; Motivans & Kyckelhahn, 2007). This increase has created a demand

for better understanding of the previously convicted federal child pornography offender.

Child Pornographers

Child pornography has existed for decades, the notoriety and proliferation have

been increased because of the internet (Goller, Jones, Dittmann, Taylor, & Graf, 2016).

Nevertheless, the illegality of material has been consistent throughout the years. The

increase in demand for the content has also fueled in increase in convictions. This, in

turn, has created a larger population of people previously convicted of a child

pornography offense. As with any crime set, comes the question of how many or how

often do these previously convicted child pornographers offend?

As previously discussed, Congress has increasingly intensified its stance against

child pornography via stiff sentencing guidelines and substantial mandatory-minimum

sentences. As these policy decisions were not arbitrary, relevant research was utilized to

support said actions. Hamilton (2011) maintained that more severe child pornography

sentences would induce a marked reduction in the demand child pornography. Therefore,

decreased demand means fewer instances of child pornography production. To reiterate,

production of child pornography is the first-hand creation of media depicting the sexual exploitation of a child. Of course, demand is central to the issue. The Department of Justice has expressed that there exists a commercial incentive in the creation and distribution of child pornography, notwithstanding the dissemination of material advertised as new or limited circulation. In short, child pornography is a highly traded commodity. As such, they take time, money, or dedicated interest to accumulate, which may make it that much hard to give up.

According to the USSC, the bulk of recidivism studies specific to child pornography offenders contain an insufficient sample size or center around offenders outside of the United States. As such, in 2011, the USSC conducted their study of 673 offenders and found that approximately five percent of non-production offenders recidivated with some sexual offense, albeit child pornography or otherwise (USSC, 2012). This means that approximately one-third of the two groups in this study are consistently found to sexually re-offend. Granted, recidivism is defined as any sexual, technical, or documented violation or arrest. What is key, is the fact that the average time of imprisonment for those that reoffended was approximately 22 percent longer than those that did no recidivate. While the study cautioned its audience against drawing definitive conclusions, the results were nevertheless telling. When applying the previously addressed SRM model, specifically the avoidant-active pathway, it seems to be the beginnings of an explanation as to why those with more extended stays in prison seem to re-offend slightly more than those with shorter prison stays.

Seto and Eke (2015) found that there is a 16 percent "sexual" recidivism rate among child pornographers, and 12 percent of those were repeat child pornography offenses (p. 427). An older study found that approximately 25 percent of federal child pornography offenders recidivated within 3.8 years of release. However, Seto and Eke's study did not distinguish between production and non-production child pornography offenders. The distinction between the two offenses is crucial. Not only do child pornography production charges result in a longer prison term, ten-year mandatory-minimum sentence, the elements of the crime are different. Non-production child pornography offenses can be committed without ever having any interaction with a child. Production offense requires some involvement in the creation of said child exploitation material. While the distinction is important, there are some that question whether those that merely possess child pornography images differ in some way to those that commit physical sex offenses. One study found that child pornography offenders recidivate at a much lower rate, and had higher demographic commonalities then contact sex offenders (Faust, Bickart, Renaud, & Camp, 2014).

The research questions in this study seek to further examine the differences between those that possess child pornography and those that receive it, with that, those that are given probation against those that are sentenced via a mandatory-minimum five-year sentence. In addition to having been convicted of a federal child pornography offense, all of the offenders contained in this study have one other thing in common, this is their first offense. As most recidivism studies show, prior criminal history is a reliable

indicator of future criminogenic activities or tendencies. One study in Switzerland found that child pornography offenders are significantly less likely to re-offend compared to offenders convicted of other types of sex offenses. Moreover, child pornographers have a considerably low progression rate, as in very few offenders progress to actual contact offenses, 0.2 percent (Goller, Jones, Dittmann, Taylor, & Graf, 2016). This same study found that the significantly low recidivism rate suggests that the most appropriate outcome is a community sentence. Granted, the results are based not on U.S. laws or offenders, but the point is this; the offenders in this proposed study have the same 'documented' criminal background, and if research shows potentially similar recidivism tendencies, then not only are mandatory-minimum sentences in need of review, but they may be serving only one purpose, which is, retribution.

While study results may vary in child pornographer recidivism rates, patterns have emerged among them concerning typology. Overwhelmingly, offenders are male and white. The USSC reported that the average age is approximately 41, with over 80 percent having some employment, no criminal records, some education, and zero reported a history of child sexual abuse. These findings were based on secondary data and not self-report data.

Also revealed by research is that child pornography offenders not only differ from contact offenders psychologically, but they are also more difficult to identify; such is the case because they are usually educated, socially adept, and have enough 'self-regulation' to avoid suspicion or more egregious crimes (Seto, 2017). As such, there is

little doubt that the two proposed study groups have more in common than their differences. What is of critical importance from extant literature is that to this day, experts are stymied in their efforts to find effective intervention. As previously stated, the issue is about sufficient self-regulation, not just enough to keep you from higher more abhorrent types of sex offenses. Mandatory-minimums, as a whole in studies, have not been found to mitigate this issue, and at times make it worse.

Recidivism

In 2014, one study revealed that 78 percent of offenders placed in federal supervision was found to be either low or moderate risk. Moreover, the persons within this classification were found to be relatively stable during supervision (Cohen & VanBenschoten, 2014). While the outcome of this study appears positive on its conclusions regarding federal offenders, the authors cautioned that the data also showed the possibility of selection bias. That is the say, the more an offender was supervised, the more they were found to be in violation, higher risk, or otherwise ineligible for reduced attention and autonomy. Much like the existing scholarly work on child pornography offenders, the data available is found to be on a spectrum. Despite the aforementioned low and moderate risk findings, the USSC concluded, after an eight-year study, that nearly one half of federal offenders released in the same year were apprehended for either a probation violation or altogether new crime (Hunt & Dumville, 2016). What is consistent with previously mentioned research is that offenders given incarceration over probation reoffended at an almost 20 percent higher rate. Again, apart from core

retributivist goals, there seems to be little utilitarian or preventative value to the use of mandatory incarceration. This appears to be especially true if the two type of offenders proposed in this study are as alike as research reveals them to be.

To further the discussion, and more importantly, the relevance of differences and similarities as it pertains to recidivism, one needs to look no farther then demographics. Aggregate research factoring all crime sets, indicate that conviction rates differ by race, with whites lowest among. This is in stark contrast with the federal child pornography offender demographic (Spljeldnes, Jung, & Yamatani, 2014), this does not pertain to the overwhelming majority of federal child pornography offenders. Gender, however, is entirely different, the bulk of federal child pornography offenders are male, which is consistent with most other crimes as indicated by recent studies (Sanchez & Lee, 2015).

The literature review examined the retributivist theory and its origins and how the retributivist theory undergirds the existence and purpose of the federal sentencing system. Also discussed was SRM, a potential explanation for the re-offending propensities of federal child pornography offenders. In discussing the criminogenic proclivities of the said offenders, a review of recidivism rates and insufficient mandatory-minimum efficacy revealed common concerns among scholars and practitioners, hence the need for additional research. While exhaustive literature exists on several of these issues independently, there is negligible agreement on how best to stem the growing rate of federal child pornography offenses, federal child pornography recidivism, much less, the impact of mandatory-minimum sentences on federal child pornography offenders. The

discussion regarding mandatory-minimum efficacy is further complicated by the fact that offenders re-offend more often the longer they are incarcerated.

In short, the literature review provides a framework for how retributivist theory results in the need for a better awareness of SRM and how the need for understanding child pornography offenders is the key to efficient policies. When statistically examined, the two groups in my proposed study are not only demographically on par, but psychologically homogenous, and a severe treatment of five-year incarceration should distinguish their recidivism rates. Nevertheless, contrasting conclusions and general social outcry for child protection have resulted in the current sentencing structure and misperceptions on how best to deal with child pornography offenders, in summation, as your standard sex offender. A United States District Court Judge once advised a federal prosecutor that a psychological metric for sex offender risk would continue being used in matters of sentencing until such time as additional research generated a better process by which to evaluate child pornography offenders specifically. Such a concession is a formal acknowledgement that the criminal justice system has yet to catch up to the unique needs and approach federal child pornography offenses require in order to aptly adjudicate cases, for both short-term retributivist goals, and long term SRM integration. That is to say, a study such as this would add to the desperately void body of knowledge needed to advise the USSC on what would best serve the United States, and thus affect positive social change.

Summary and Conclusion

This literature review, also clearly demonstrated the lack of empirical research available to support the notion that mandatory-minimum sentences are a better deterrent or more effective means of punishing federal child pornography offenders than a term of probation. Also validated is the propensity for federal Judges to downward depart from suggested guidelines when sentencing child pornography offenses, an apparent contravention of punitive goals for which the guidelines were established. As such, based upon the theoretical framework of SRM, researching, studying, and use of more empirically based punitive measures will not only shed light on mandatory-minimum efficacy, but also will potentially deter and curb federal child pornographer recidivism.

The upcoming Chapter 3 will examine in details the research design and methodology proposed for this study. Chapter 3 will also provide amplifying information regarding the research population and the ethical precautions used to ensure the protection of the said population along with descriptions of the data collection and analysis procedures

Chapter 3: Research Method

Introduction

The purpose of this nonexperimental, quantitative study was to compare the likelihood of recidivism in federal child pornography offenders given two different sentences—mandatory-minimum (5 years of incarceration) or probation—and to assess if a difference exists and whether this difference is by chance. To answer this, I used a Chi-square test of statistical significance because these tests are used to determine the probability that a finding arose by chance (O'Sullivan et al., 2008). I also sought to examine the potential measures of predictability for recidivism likelihood in federally convicted child pornography offenders. This examination was accomplished via a binary logistical regression, which is used for assessing the strength of a relationship between an independent and dependent variable (O'Sullivan et al., 2008). This chapter provides information about the methodology that was used to examine the given research questions.

Research Questions

Research Question 1: Is there a difference in recidivism between federally convicted child pornography offenders exposed to a mandatory-minimum sentence (Group A) and those federally convicted child pornography offenders expose to a term of probation (Group B)?

H_1 1: The likelihood of recidivism for Groups A and B are significantly different.

$H_0$1: The likelihood of recidivism for Groups A and B are not significantly different.

Research Question 2: To what extent does federal conviction of possession of child pornography, federal conviction of receipt of child pornography, age, race, and time on supervised release (1 to 5 years, 6 to 10 years, 11 to 20 years, and 21 to 99 years) offer a measure of predictability for the likelihood of recidivism?

H_1 2: Federal conviction of possession of child pornography, federal conviction of receipt of child pornography, age, race, and time on supervised release (1 to 5 years, 6 to 10 years, 11 to 20 years, and 21 to 99 years) offer a measure of predictability for projecting the likelihood of recidivism.

$H_0$2: Federal conviction of possession of child pornography, federal conviction of receipt of child pornography, age, race, and time on supervised release (1 to 5 years, 6 to 10 years, 11 to 20 years, and 21 to 99 years) do not offer a measure of predictability for projecting the likelihood of recidivism.

The research questions and hypotheses address several variables. The population in this study is comprised of two groups that differ in sentence experience (mandatory-minimum 5 or more years of incarceration or a term of probation) and crime of conviction (receipt of child pornography versus possession of child pornography). The mandatory-minimum cohort received a 5-year term of imprisonment as a result of a conviction for a federal child pornography charge. The probation cohort underwent no incarceration and are subject to post-conviction monitoring.

The literature was used to offer insight into some parts of the research questions. For example, DeLisi et al. (2016) found that 69% of federal offenders self-reported a physical sexual offense for which they were never caught, meaning there are undiscovered abusers. This combines Group A and B of Research Question 1 in terms of recidivism predictability; however, it does not address what difference 5 years between the two groups can make. Cohen and VanBenschoten (2014) also reported that next to criminal history, age scores higher in terms of predictability, though this also does not address other predictability factors like race, treatment type, or sentence experience. Finally, Mears, Cochran, and Cullen (2015) concluded that incarceration and lengths of stay are not reliable recidivism predictors, as incarceration has either increased or decreased recidivism. Thus, I explored the difference between Groups A and B regarding recidivism and predictive factors of possession of child pornography, federal conviction of receipt of child pornography, age, race, and time on supervised release (1 to 5 years, 6 to 10 years, 11 to 20 years, and 21 to 99 years).

Research Design and Rationale

I examined the possibility of a significant difference between the recidivism rates of Groups A and B. To do so, I compared them with a Chi-square test of independence. This type of analysis is a type of inferential statistic that allows the researcher to use sample data to infer population characteristics. A Chi-square test yields a probability that the variables in a population are not related, which would help determine whether sentence experience is unrelated to recidivism. A binary logistic regression analysis was

used to assess the levels of predictability for the specific federal crime of conviction (possession of child pornography and receipt of child pornography), age, race, and time on supervised release (1 to 5 years, 6 to 10 years, 11 to 20 years, and 21 to 99 years) as discussed in Research Question 2.

The independent variable for Research Questions 1 is federal sentence (probation and mandatory-minimum incarceration). The dependent variable for Research Question 1 is the likelihood of recidivism for federal sentence, a binary value. The independent variables for Research Question 2 are specific federal crime of conviction (possession of child pornography and receipt of child pornography), age, race, and time on supervised release (1 to 5 years, 6 to 10 years, 11 to 20 years, and 21 to 99 years). The dependent variable is the likelihood of recidivism.

Given that recidivism rates are a numeric value, the most appropriate method to answer the research question was a quantitative research method of observation (Creswell & Creswell, 2017). Further, a correlational design is most appropriate for the interpretation of findings when seeking to asses and make conclusions regarding program effectiveness (Warner, 2013). Correlational designs are useful for testing a set of hypothesized relationships between certain variables for outcome predictability (Cook, 2015; Warner, 2013; White & Sabarwal, 2014). Although this design does not convey causal information for the variables, it did provide empirical evidence with which to determine whether the selected variables are related.

Methodology

Population

The target population, Groups A and B, were offenders convicted of a federal child pornography offense. The specific federal charge pertaining to Group A, Title 18 of the United States Code (USC) Section 2252A(a)(2), (b)(1)(2), receipt of child pornography, carries with it an incarceration term of not less than 5 years. Group B population was federal offenders convicted of Title 18 USC 2252A(a)(5)(b)(3), possession of child pornography with a corresponding sentence of probation and no time of incarceration (Cornell University Law School, The Legal Information Institute, 2015). The size of the target population was138, which is greater than a similar study done in 2011 (see Walker, 2011).

Sampling Procedure

I used purposive sampling because I used secondary data, making random assignment not possible. A documented concern with correlational studies is the increasing possibility of rejecting the null hypothesis when it is determined to be true (Frankfort-Nachmias, Nachmias, & DeWaard, 2015). For this reason, determining the appropriate sample size was important effect size and sufficient power. To determine the appropriate sample size for this study necessary for adequate power, I used the G*Power statistical tool (Faul, Erdfelder, Lang, & Buchner, 2007). After using the logistical regression analytical procedure options for the G*Power tool, the minimum sample size for this study was 138. The sample size of 138 was calculated by inputting the following

values: assuming a two-tailed analysis, effect size (0.15), power (.95), and alpha (.05). According to PACER, approximately 200 child pornography offenders were convicted in two states alone (California, Florida) since 2005. As such, obtaining the minimum sample size for the specified population criterion (Groups A and B) in a shorter amount of time for the entire United States was attainable.

The effect size reveals the strength of a relationship between examined variables, providing a metric in determining impact. The effect size chosen to for input into G*Power was .15. This is considered to represent a medium effect. As previously stated, effect size is a significant indicator when conducting correlational research. Therefore, the effect size was a review of similar recidivism studies revealed the employment of a range of effect size from .13 to .80. An effect size at the high end of .80 would require a sample size of 31. Larger samples increase power and decrease the possibility of error estimation (Wilson, VanMoon, & Morgan, 2007). Therefore, a conservative effect size of .15 was chosen because the minimum sample size for this effect size was available. In addition to power adequate for the study, the calculated sample size was helpful in reducing bias via a two-tailed test as opposed to a one-tailed test due to the fact that directionality is not assumed (Frankfort-Nachmias et al., 2015). The data were entered and analyzed in SPSS.

Instrumentation

A research instrument was not needed or used for this study. All of the acquired data were archival. Secondary data are important for conducting research that might

otherwise be impractical or impossible to conduct due to the constraints that typically accompany primary data gathering (O'Sullivan et al., 2008; Vartanian, 2010). As prisoners are categorized as vulnerable subjects, research would have been difficult and impracticable were it not for secondary data.

The first of the secondary data were the California sex offender registry or the official State of California Department of Justice's Megan's Law Website. This yielded conviction data that are publicly available. This website is produced via court documents that are also publicly available. For this study, conviction data were compared against federal court records from the clerk of the court via PACER. PACER is an electronic public access service that allows users to obtain case and docket information online from federal courts. These sources include identifiers that are publicly available such as name, crime of conviction, date of conviction, date of birth, gender, age, and re-offense. Cross comparison of these sources is integral to ensure the population is properly narrowed as defined by this study and to double-check the secondary data for possible administrative errors. The data compiled has been and continues to be securely stored and encrypted.

Even though the information was publicly available, random identifiers were used to further ensure the study population was safeguarded from possible harm. As this data are publicly available, permission for data access were not required. PACER, the publicly available federal court database consolidates all federal child pornography crimes under one category. Therefore, it is difficult to personally isolate federally convicted child pornography offenders by Group A and B. After a disscution with the U.S. Attorney's

Office, I learned that they have an internal database capable of filtering through all prosecuted cases by crime of conviction. A request was placed with the Executive Office of the U.S. Attorney to assist in more efficient data identification upon approval of the study. To organize the sample of names from the Executive Office of the U.S. Attorney, I planned to generate random number assignment via Microsoft Excel for each name. Subsequently, I intended to transplant these values into a new database and sort the newly assigned 138 random numbers in ascending order. The manual collection of data also led to careful identification of predictor or independent variables required in Research Question 2.

I did not have any communication or contact with the federally convicted child pornography offenders. The data used were entirely archival, which were collected through the normal course of federal criminal court proceedings. I also used sex-offender registation information from the the Dru Sjodin National Sex Offender Public Website, which is maintained in partnership with the U.S. Department of Justice. Again, I extracted court documents for each of the federal child pornography offenders via PACER. The collective use of each of these data resources yielded individual crime of convcition, age, race, and time of supervised release, all of the variables addressed in Research Question 2.

Although some of the data sources yield similar information, the overlap served as a crosscheck to ensure accuracy. If an administrative error led to a record discrepency, I would be able to crosscheck of the data sources. A thorough review ensured that each of

the federal child pornographer offenders fall within the parameter of first-time offenders,

allowing for a baseline assesment of their sentence experience, likelihood of recidivism,

and variable predictability. Lastly, a multiple data source review confirmed the offenders

binary criterion for likelihood of recidivism by revealing the existsence or absence of a

new offense.

Operationalization: Variable Description

Research Question 1 addressed the possibility of a significant difference between

recidivism in Groups A and B. I compared the recidivism between the groups with a Chi-

square test of independence. The independent variables were Groups A and B, and the

dependent variable was the binary outcome of recidivism: federal mandatory minimum

sentence (5 or more years) and federal probation sentence (FPS). For this study,

recidivism is defined as the documented conviction of a subsequent sexual offense (Loza,

2018; Schmucker, Lösel, & Schmucker, 2017). Recidivism for this study is further

defined as the new conviction of a sexual offense that occurs at any point subsequent to

offenders' initial conviction of record. As the dependent variable, recidivism was scored

for Groups A and B as 0 for no recidivism and 1 for recidivism. For example, an

examination of all the records for Group A revealed a total number of Group A offenders

who did not recidivate, score of 0, and a total number Group A who did recidivate, score

of 1.

Additionally, I employed a survival analysis for the data and variables in

Research Question 1. Generally, survival analysis is a set of statistical measures whereby

the outcome variable of the analysis is time until an event occurs (Kleinbaum & Klein, 2012). Time is defined as the period when monitoring begins until an event occurs. For this study, the monitoring period was the amount of time on supervised release before the designated event. This type of analysis is commonly used in the health sciences to examine success or failures in medication or treatment. Events are often categorized or defined as deaths, remission relapse, or recovery. The designated event for this study will be recidivism. In survival analysis, events are typically referred to as failures. Such is the case because typical events of interest in survival analysis include death, relapse or some other adverse occurrence. In the case of the study, the connotation is fitting as the designated event or failure will be offender recidivism.

A commonly used method in survival analysis is the Kaplan-Meier method (Laerd Statistics, 2013), which is a nonparametric procedure for probability estimation of survival past failure. Survival is merely a time variable that gives the time an individual has survived beyond the designated period of observation. Given that data is being requested from 2012 through 2015, this allowed for an observation period of one to 72 months by the time data was acquired. This type of analysis yielded a survival distribution (based on time until recidivism) for offenders receiving one of the two sentences described in Research Question 1. Moreover, the survival distributions of these two groups of a between-subjects factor were compared for equality. The survival time variable was time to recidivism, and the between-subjects factor was offender sentence.

Research Question 2 included five predictor or independent variables that depending on the results of the data, sought to assess measures of recidivism predictability. *Federal conviction of possession of child pornography* is the first independent variable for Research Question 2. This federal charge is a violation of Title 18 United States Code Section 2252A(a)(5)(b)(3). This criminal charge does not carry a mandatory-minimum sentence, but rather a range from probation, zero incarceration, to several years in federal prison. This is the charge applied to Group B from Research Question 1. *Federal conviction of Receipt of Child Pornography* is the second independent variable for Research Question 2. This federal charge is a violation of Title 18 United States Code Section 2252A(a)(2)(b)(1)(2). This criminal charge carries a mandatory-minimum sentence of 5-years' incarceration. Similarly, five years is the mandated low end of the available sentencing range. This is the charge applied to Group A from Research Question 1. *Age* is the third variable for Research Question 2; the federal child pornography offenders included in this study will range in age from 18 to 99. Age is also a necessary variable because either preceding charge requires the depiction of children as defined as being under the age of 18. *Race or ethnicity* is the fourth independent variable for Research Question 2. The population of this study will not exclude any of the offenders based on race or ethnicity. The population will be categorized as follows: African American, Caucasian, Hispanic, American Indian, and Asian. *Time of supervised release* is the fifth and final predictor or independent variable. Post-conviction supervision time requirements are based upon several factors specific to

each offender, as such they can vary from person to person. The time of supervised

release will be captured and categorized as follows: (a) 1 to 5 years, (b) 6 to 10 years, (c)

11 to 20 years, and (d) 21 to 99 years.

Recidivism was the dependent variable and scored for as 0 for no recidivism and

1 for recidivism. The two crimes at the time of conviction are categorical variables, age

and time of supervised release are continuous or ordinal variables.

Data Analysis Plan

Research Question 1 was analyzed using a chi-square analysis, and Research

Question 2 data will be analyzed using a binary logistic regression. Data analysis was

accomplished using Statistical Package for the Social Sciences (SPSS) software package

version 21. For meaningful and appropriate statistical analysis, I will check for errors as

well as outliers and multicollinearity (McNabb, 2002; Trochim et al., 2015; Warner,

2013). The benefit of using archive data is the ability to conduct statistical analysis from

real world dynamics to empirically support optimal policy decision: Thusly, positive

social change becomes that much more attainable. Moreover, a study such as this,

contributes to the existing body of knowledge not only by offering levels of statistical

significance, but practical significance as well in the realm of policy analysis and

modification.

<div align="center">

Threats to Validity

</div>

Research is conducted for the purpose of adding something new to the topic at

hand. However, for value to exist, the results need to be valid. In research, validity is

generally discussed in terms of internal and external capacities. The first section will discuss internal validity, which is the examination of whether or not the dependent variable was affected by an alternative other than the independent variable (Creswell, 2009; Frankfort-Nachmias et al., 2015; O'Sullivan et al., 2008; Trochim et al., 2015). The next section will be a discussion pertaining to external validity, which in short is the ability to apply the findings of this study to population or areas not involved in this study (Creswell, 2009; Frankfort-Nachmias et al., 2015; O'Sullivan et al., 2008; Trochim et al., 2015).

Internal Validity

As previously mentioned, a conclusion cannot be made that one variable is definitively responsible for the change in another unless all other possible factors are ruled out. Such ancillary factors are the threats to internal validity. Generally speaking, internal validity is heavily focused on cause and effect, a phenomenon typically associated with experimental designs (Creswell, 2009; Frankfort-Nachmias et al., 2015). This study did not seek to establish a cause and effect relationship amongst the variables and therefore does not fall under the auspice of experimental designs. Moreover, there were not treatments or interventions that might affect or bias the population sampled. The fact that secondary data was used negates the prospect of the study population being aware of the study much less the possibility of interaction accompanied by selection effect. As previously addressed, federal criminal records are meticulously collected, reviewed and maintained (Ardia & Klinefelter, 2015). As such, the threat or risk of

instrumentation, which is the change in instrumentation between the start and conclusion of data collection, is significantly reduced. While maturation is common concern, research has found that the bulk of recidivism takes place within three to five years (Seto & Eke, 2015). However, it should be noted that this time frame is an operational parameter that strictly references additional convictions, not necessarily arrests or probation violations which often do occur much sooner than three years (Ostermann, Salerno, & Hyatt, 2015). Given that the population was limited to convictions between 2012 and 2015, this satisfactorily addressed the negative risk of maturation. Given that legal, judicial and administrative constraints prohibit offenders from dropping out of prosecutions, there was no risk of experimental mortality.

In summation, the greatest threat to internal validity was the inability to randomly assign the population sample or control the independent variables; this is the nature and risk of using a non-experimental design (Creswell, 2009; O'Sullivan et al., 2008; Trochim et al., 2015). The lack of such control also means that the population may not be entirely equal, and thus possibly prone to recidivate because of unaccounted for factors. Yet, a narrow scope in population selection as well as equivilent sex offender history made great strides in homogenizing the population sample.

External Validity

External validity is the measure of how generalizable a study is. As a matter of practicality, studies will not always be able to assess every single program or person. Such is the case with recidivism studies, it is impractical to attempt a study that assesses

every convicted federal offender alive today. Of the main aims when considering external validity, this study sought to generalize from a small sample to a larger sample as well as generalize from a research study to a real-world situation (Creswell, 2009; O'Sullivan et al., 2008). The data pulled from this study represented several federal district courts in the United States. Moreover, the population of federal child pornography offenders is extremely small compared to the rest of the population. Child pornography accounted for just under three percent of all fiscal year 2016 criminal cases. With a total federal criminal count of approximately 67,000 cases, this amounts to a grand total of 1,900 cases of federal child pornography cases for the entire year (USSC, 2017). Thus, the generalizability specifically for federal child pornographer research is strong.

Conclusion Validity

Conclusion validity is the reasonableness or correctness of relationships between the data and given variables within the study (Morgan & Hodge, 2015). Given the construct of this research design, the main threat to conclusion validity was archival data reliability. Obviously, if the court records or sex offender registration information contained errors, this could have impacted the analysis of data as well as the results of the study. However, the previously mentioned redundancy in record review minimizes the threat to conclusions validity.

<div align="center">

Ethical Procedures

</div>

There was a consultation session with the U.S. Attorney's Office. While the request to provide filtered access to the necessary information for data required for this

study is not guaranteed, I was assured that the request would be processed with

substantial support. I explained the overall purpose and scope of the study and was

advised that similar information has been granted before.

As this study utilized archival data pertaining to federally convicted offenders

having already undergone prosecution, there was no concern in terms of human

treatment. As previously stated, this information is publicly available and therefore data

collection is available to any person willing to seek it out. Moreover, as registered sex

offenders, the participants in this study do not have a legal standing to secure or

otherwise refuse exposure of mandatory information. As this study did not require

personal contact with these individuals, there was minimal if any chance of adverse

effects from.

Ultimately the only ethical concern with this study was the treatment of data. As

previously stated, the offenders remained anonymous since the names were removed and

identifiers applied during data analysis. The files containing the compiled data with any

personally identifying information has been externally stored on a hard drive. This

external hard drive has been locked in a secure storage only accessible by me on a secure

military installation. As a precaution, the files containing offender identifying

information and data analysis were only accessed while my laptop was offline and in

airplane mode. This ensured that the sensitive information was only available locally and

removed any risk of remote access or exposure. A subsequent final precautionary

measure, I password protected and encrypted all files and information containing

identifying information. In the event of hardware damage or unforeseen problems, I employed redundant measures by storing a backup copy of the aforementioned information in the secure space already described. Finally, I will still ensure that that all secured drives and contained data are destroyed after a period of seven years. The external drive and back up copy were formatted so as to overwrite any existing data, and physically destroyed in a method recommended by industry computer forensic experts

Summary

The purpose of this quantitative non-experimental design was to assess the difference in the likelihood recidivism for the two main groups in this study, as well as to examine correlational relationships, among the described variables and the dependent variable of recidivism. Information contained in this chapter explained the chosen methodology, rationale, and necessary procedures to carry out said design. The chosen study population was clearly defined, federal child pornography offenders, and the independent and dependent variables identified. After data acquisition, analysis was conducted to reveal the nature of the relationship between sentence experience and recidivism, as well as potentially measures of predictability with regard to federal child pornography offenders and recidivism. For the initial research question, a Chi-square test of significance was used, and binary logistic regression for the second research question. The end goal was to accurately assess variable relationships and the potentiality of recidivism predictability.

The following two chapters will report the results of this study as well as address the value and placement of said results into extant literature. Chapter 4 will yield information about the collection of data, variable - demographic breakdown, and subsequent data analysis results. Chapter 5 will bridge the gap between study results and current literature, as well as provide recommendations for additional research or study focus. Lastly, the final chapter will highlight the study benefits and how this research has contributed to positive social change.

Chapter 4: Results

Introduction

The purpose of this quantitative study was to compare recidivism in federal child pornography offenders given two different sentences—mandatory-minimum (5-year' incarceration) or probation—and to examine which sentence yielded a lower recidivism rate. For this study, *recidivism* is defined as the conviction of a subsequent sexual offense under any United States jurisdiction, federal, state or local (Loza, 2018; Schmucker et al., 2017). Additionally, I examined several factors as potential predictors of recidivism in the same group to understand the relationship between federal sentencing and federal child pornographer recidivism: crime of conviction, age, race, time on supervised release. The federal child pornography offenders were divided into two groups, those sentenced to a mandatory-minimum term of 5 years' incarceration and those given probation and no incarceration. The second analysis divided the groups in a different category by crime of conviction rather than sentence.

All data were analyzed via the SPSS software package version 25. Research Question 1 involved a Chi square to test the null hypothesis, and a binary logistic regression was used to test the null hypotheses for Research Question 2. The research questions and corresponding hypotheses were:

Research Question 1: Is there a difference in recidivism between federally convicted child pornography offenders exposed to a mandatory-minimum sentence

(Group A) and those federally convicted child pornography offenders exposed to a term

of probation (Group B)?

H_1 1: The likelihood of recidivism for Groups A and B are significantly different.

$H_0$1: The likelihood of recidivism for Groups A and B are not significantly

different.

Research Question 2: To what extent does federal conviction of possession of

child pornography, federal conviction of receipt of child pornography, age, race, and time

on supervised release (1 to 5 years, 6 to 10 years, 11 to 20 years, and 21 to 99 years) offer

a measure of predictability for the likelihood of recidivism?

H_1 2: Federal conviction of possession of child pornography, federal conviction

of receipt of child pornography, age, race, and time on supervised release (1 to 5 years, 6

to 10 years, 11 to 20 years, and 21 to 99 years) offer a measure of predictability for

projecting the likelihood of recidivism.

$H_0$2: The following variables, federal conviction of possession of child

pornography, federal conviction of receipt of child pornography, age, race, and time on

supervised release (1 to 5 years, 6 to 10 years, 11 to 20 years, and 21 to 99 years) do not

offer a measure of predictability for projecting the likelihood of recidivism.

I examined the possibility of a significant difference between recidivism in

Groups A and B with a Chi-square test of independence. I used binary logistic regression

to assess the levels of predictability between Groups A and B recidivism rates and

additional variables discussed in Research Question 2. Examining the statistical

relationships among the recidivism rates for these two groups as well as potential predictive values can help policy-makers see the efficacy of existing sentencing policies and devise better ways to institute discharge programs and reintegration training (Grossi, 2017) to help these offenders overcome their addiction and readjust into their communities and society. Therefore, this study will address gaps in data specific to the previously mentioned relationship, especially regarding sentence effectiveness and recidivism forecasting.

Data Collection

As previously discussed in Chapter 3, data were requested via a Freedom of Information Act request from the Executive Office of the U.S. Attorney. I sought federal court case numbers that would identify federal cases and by extension federal offenders that fit within the population needs of this study and research questions. However, the Freedom of Information Act response from Executive Office of the U.S. Attorney contained internal case numbers that could not be used to specifically identify federal cases. As such, the response was unable to serve the original purpose of filtering for only study-eligible offenders and it was not possible to determine if the offenders of the corresponding internal case numbers had reoffended because these offenders could not be identified by the internal Executive Office of the U.S. Attorney cases numbers. However, the Freedom of Information Act response provided specific number and dates of cases that contained offenders within the scope of the study's needed population. As such, this information was used to query PACER for cases on given dates, and I compared the

overall number of applicable cases-offenders to the data provided by the Executive Office of the U.S. Attorney for accuracy.

The fact that the data came from federal court records that are checked throughout the collection process significantly reduces the possibility of data discrepancy. Moreover, the operational definition of recidivism in this study mitigates the possibility of error given the numerous legal proceedings that lead up to a conviction. Additionally, Title 45 of the U.S. Code of Federal Regulation Part 46.104 states that sources that are publicly available and will be recorded in a manner that prevents subjects from being linked or directly identified are exempt from formal review (Government Publishing Office, 2018). However, the research institution reserves the right to set forth parameters, such as review and approval by an IRB. As such, PACER sentencing data and The Dru Sjodin National Sex Offender Public Website yielded identifying characteristics, but these identifiers were removed prior to analysis in accordance with Walden University IRB standards and requirements.

As previously stated, PACER provided the specific federally convicted child exploitation offenders that fell within the scope of the research questions and sample parameters for this study. These offenders were checked against two different data sources for redundant data verification and accuracy. First, all offenders were checked against the National Sex Offender Public Website, which is the only U.S. government website that links territorial, state, and tribal sex offender registries. This website yielded confirmation of their initial federal conviction as well as subsequent sexual offense,

which aided in the discovery of recidivism for the purposes of this study. Second, all offenders were checked against another website called Instant Checkmate. For a monthly fee, it will aggregate public records for any individual within moments. As conviction documents are a matter of public record, the initial federal conviction and subsequent sex offenses, as applicable, are revealed in the search results. All 70 offenders were run through the National Sex Offender Public Website as well as Instant Checkmate to determine recidivism as well as data verification. Although the offenders needed to be identified by name and date of birth for recidivism determination, written consent from each participant was not needed because state and federal law make their conviction and required sex offender registration publicly available.

Although the data did not contain discrepancies, there were challenges in acquiring the original sample size of 138 that would represent all judicial districts in the United States. Thus, data yielded a slightly reduced sample size of 70, which represents three states—California, Oregon and Washington—as well as seven federal judicial districts over a span of 4 years. Although the most effective way to increase a sample size for this study would be to expand the time-frame beyond the 4 years from conviction, increasing the sample size in this way would also taint the comparative value in "street time" given that research has placed the standard recidivism window at approximately 3 to 4 years (Bales, Bedard, Quinn, Ensley, & Holley, 2005; Farabee & Knight, 2002). After 4 years, the likelihood of recidivism has been shown to steadily decline. Street time is the time during which the offender is at risk of recidivism. As such, this is the requisite

period in which recidivism studies should take place. Most importantly, these 70

offenders represent 100% of the offenders that fall within the scope of my study for the

calendar years of 2012 through 2016 in California, Oregon, and Washington.

Demographics

The data collected from PACER, National Sex Offender Public Website, and

Instant Checkmate yielded specific demographic information about the sex offenders:

race, crime of conviction, gender, federal jurisdiction of conviction, sentence for initial

crime of conviction, time on supervised release, and whether the offenders reoffended or

recidivated after their initial federal conviction. These factors were used to answer

Research Questions 1 and 2. The following tables display the summary results. This

sample was entirely made up of males ($n = 70$). The race of most of the offenders was

White (97.1%; see Table 6), and the mean age of the offenders were 52.07 ($SD = 15.06$;

see Table 1).

Table 1

Demographics of Sex Offenders

		Federal Sentence Received	Age of Offender	Did Offender Reoffend/Recidivate?	Race of Offender	Crime of Conviction
N	Valid	70	70	70	70	70
	Missing	0	0	0	0	0
Mean			52.07			
SD			15.06			

Table 2

Time on Supervised Release Statistics

		(Years)	Federal Judicial District
N	Valid	70	70
	Missing	0	0
Mean		2.31	
Std. Deviation		.925	

Table 3

Frequency of Federal Sentence Received

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Federal Probation Sentence	26	37.1	37.1	37.1
	Federal Mandatory Minimum	44	62.9	62.9	100.0
	Total	70	100.0	100.0	

Table 4

Age of Offender

	Frequency	Valid Percent	Valid Percent	Cumulative Percent
21	1	1.4	1.4	1.4
27	1	1.4	1.4	2.9
28	1	1.4	1.4	4.3
30	1	1.4	1.4	5.7
32	4	5.7	5.7	11.4
33	1	1.4	1.4	12.9
34	1	1.4	1.4	14.3
35	3	4.3	4.3	18.6
36	1	1.4	1.4	20.0
37	1	1.4	1.4	21.4
39	2	2.9	2.9	24.3
40	2	2.9	2.9	27.1
41	1	1.4	1.4	28.6
42	3	4.3	4.3	32.9
43	1	1.4	1.4	34.3
45	1	1.4	1.4	35.7
47	2	2.9	2.9	38.6
48	2	2.9	2.9	41.4
49	3	4.3	4.3	45.7
50	2	2.9	2.9	48.6
51	2	2.9	2.9	51.4
52	1	1.4	1.4	52.9
54	1	1.4	1.4	54.3
55	1	1.4	1.4	55.7
57	4	5.7	5.7	61.4
58	1	1.4	1.4	62.9
59	4	5.7	5.7	68.6
60	1	1.4	1.4	70.0
62	1	1.4	1.4	71.4
63	2	2.9	2.9	74.3
64	2	2.9	2.9	77.1
66	1	1.4	1.4	78.6
67	3	4.3	4.3	82.9
68	3	4.3	4.3	87.1
71	2	2.9	2.9	90.0
74	1	1.4	1.4	91.4
75	2	2.9	2.9	94.3
76	2	2.9	2.9	97.1
77	1	1.4	1.4	98.6
89	1	1.4	1.4	100.0
Total	70	100.0	100.0	

Table 5

Frequency of Reoffend/Recidivate

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	NO	59	84.3	84.3	84.3
	YES	11	15.7	15.7	100.0
	Total	70	100.0	100.0	

Table 6

Race of Offender

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	WHITE	68	97.1	97.1	97.1
	BLACK	1	1.4	1.4	98.6
	ASIAN	1	1.4	1.4	100.0
	Total	70	100.0	100.0	

Table 7

Crime of Conviction

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	POSSESSION of Child Pornography	26	37.1	37.1	37.1
	RECEIPT of Child Pornography	44	62.9	62.9	100.0
	Total	70	100.0	100.0	

Table 8

Time on Supervised Release (Years)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1 to 5 Years TOS	14	20.0	20.0	20.0
	6 to 10 Years TOS	28	40.0	40.0	60.0
	11 to 20 Years TOS	20	28.6	28.6	88.6
	21 to 99 Years TOS	8	11.4	11.4	100.0
	Total	70	100.0	100.0	

Most of the offenders were sentenced to FMMs ($n = 44$, 62.9%; see Table 7). This is consistent with the normal prosecutorial operations of federal prosecutors nationwide. Federal convictions for child exploitation offenses carry significant penalties, so they are only accepted by federal prosecutors after much scrutiny for substantial evidence. Therefore, fewer cases are accepted with the outset goal of zero incarceration or probation. This also indicates that more people were prosecuted for receipt or distribution of child pornography than simple possession of child pornography—the distinction being the overt act of acquiring or disseminating the contraband material. This is evident because receipt and distribution of child pornography carry FMMs, whereas possession charges do not. Of the three states and seven federal jurisdictions sampled, the Southern District of California yielded the highest number of federal child exploitation offenders that fell within the scope of this study, ($n = 23$) at 32.9% (Table 9). Finally, of the 70 sampled offenders, 11 (15.7%) recidivated (see Table 5), which means they were convicted of a subsequent sexual offense.

Table 9

Federal Judicial District

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	California-Southern	23	32.9	32.9	32.9
	California-Central	6	8.6	8.6	41.4
	California-Eastern	11	15.7	15.7	57.1
	California-Northern	1	1.4	1.4	58.6
	Oregon	4	5.7	5.7	64.3
	Washington State-Western	18	25.7	25.7	90.0
	Washington State-Eastern	7	10.0	10.0	100.0
	Total	70	100.0	100.0	

The population in this study comprises every convicted FMM and FPS child pornography offender of the previously listed seven judicial districts from 2012 through 2016. Over the four-year period, there were 26 FPS child pornography offenders. While this seems small, the entire U.S. FPS child pornography offender population in 2010 was 27 (USSC, 2012). Of note, the FPS sample of this study, three states, is one person less that the entire U.S. FPS child pornography population in 2010. As for FMM child pornography offenders, in 2010 there were 322 (USSC, 2011). Given that this figure averages to just over six FMM child pornography offenders per state, the study sample size of 44 appears to not only be sufficient but an indication of an increase as well at approximately 14 per state.

Results

Research Question 1. Is there a difference in recidivism between federally convicted child pornography offenders exposed to a mandatory-minimum sentence

(Group A) and those federally convicted child pornography offenders exposed to a term

of probation (Group B)?

H_1 1. The likelihood of recidivism for Groups A and B are significantly different.

$H_0$1. The likelihood of recidivism for Groups A and B are not significantly

different

The analysis yielded results, which failed to reject the null hypothesis. Therefore,

there is not enough evidence of significant differences in recidivism between Groups A

and B. Additionally, the observed differences that appear in data exist by chance of

sampling. A chi-square test of significance was used to examine the relationship between

the independent and dependent variables. And as previously discussed, this test is also

useful in determining variable independence of one another. The dependent variable used

in Research Question 1 is recidivism, which is a nominal level of measurement.

This study examined the difference in recidivism occurrence between federal

child pornography offenders that received probation and those that received a mandatory-

minimum term of incarceration. To do so, the two dichotomous variables were compared

(see Table 10).

Table 10

Federal Child Pornographer Recidivism Rate Comparison

Recidivism	FPS	FMM	
No	19 (27% of total)	40 (57% of total)	84% No Recidivism
Yes	7 (10% of total)	4 (6% of total)	16% Recidivism
Total	26	44	*70*

The analysis revealed that of the 44 FMM sentenced offenders, four reoffended (10%). Of the 26 FPS sentenced offenders, seven reoffended (36.8%). A database was created using these figures and were subsequently input and analyzed by the SPSS. I reviewed the SPSS output from the analysis to determine if there is a significant difference in the recidivism rate between FPS and FMM sentenced child pornography offenders.

Initially, a Pearson Chi-square test score of .048 indicated that a rejection of the null hypothesis for this research question would be appropriate given that $p < .05$. The Chi-square statistic (χ^2) was computed by the observed and expected frequencies of FPS and FMM offenders that did and did not recidivate, $\chi^2 = 3.88$. I calculated the degrees of freedom (df), (2-1)(2-1) = 1. After obtaining the χ^2 I consulted a Distribution of Chi-square critical values table. The obtained χ^2 value of 3.92 exceeded the critical value under p of .05 and 1 df ($\chi^2_{crit(.05,1)} = 3.81$), but not the value under $p = .02$ and 1 df ($\chi^2_{crit(.02,1)} = 5.41$). Therefore, the results of this test appear to be significant at $p < .05$ and thusly a rejection of the null hypothesis in Research Question 1 would seem appropriate. The inference being that the differences in recidivism among the two groups, FPS and FMM, are too large to have occurred purely by chance. Although in both groups the majority of the federal child pornography offenders did not recidivate, the percentage of FPS offenders recidivating is higher than that of FMM sentenced offenders. Therefore, the result of the study suggests that the likelihood of recidivism may depend on the sentenced received.

However, a closer review of the analysis output revealed that at least one cell (25%) had an expected count of less than five. In cases such as this, when the expected counts are small, less than five, the χ^2 value tends to be inflated. This results in a mistaken rejection of the null hypothesis when it should in fact, be retained. Unaccounted for, this would lead to a Type I error. Therefore, in 2x2 tables, which this is, when one or more expected counts are less than five the standard practice is to utilize the Fishers exact test, which in this case is .086. Given that .086 yields a $p > .05$, there is not enough evidence to reject the null hypothesis as the value exceeds 5%. The relative proportions of sentence experience are independent of outcome, in this case, recidivism. Therefore, the Research Question 1 null hypothesis must be accepted. Thus, there is no relationship between recidivism and the probation or mandatory minimum sentence given to federal child pornography offenders.

As previously explained, a survival analysis is a set of statistical measures whereby the outcome variable of the analysis is time until an event occurs (Kleinbaum & Klein, 2012). For this study, time was defined as the period when monitoring begins until an event occurs. The monitoring period was the amount of time on supervised release before the designated event. The designated event for this study was recidivism. In survival analysis, events are typically referred to as failures. Such is the case because typical events of interest in survival analysis include death, relapse or some other adverse occurrence.

SPSS was used to run a survival analysis, specifically a Kaplan-Meier test to

measure the fraction of federal child exploitation offenders' recidivism behavior for a

certain amount of time (length of supervised release) after sentencing. Moreover, a log

rank test was incorporated into this analysis to compare the event or recidivism

distribution of the two groups. In the case of the FMM sentenced offenders, this begins

after they have been released from the minimum term of incarceration. The results of the

log rank (Mantel-Cox) showed a chi-square of 2.951, df of 1, and sig. of .086. Whereas

the FPS group had higher recidivism the log rank overall comparison score yielded $p =$

.086. Therefore, it can be concluded that there is not a statistically significant level of

difference between the survival or non-recidivating time of FPS offenders and those

sentenced to FMM.

Research Question 2. To what extent does federal conviction of possession of

child pornography, federal conviction of receipt of child pornography, age, race, and time

on supervised release (1 to 5 years, 6 to 10 years, 11 to 20 years, and 21 to 99 years) offer

a measure of predictability for the likelihood of recidivism?

H_1 2. Federal conviction of possession of child pornography, federal conviction

of receipt of child pornography, age, race, and time on supervised release (1 to 5 years, 6

to 10 years, 11 to 20 years, and 21 to 99 years) offer a measure of predictability for

projecting the likelihood of recidivism.

$H_0$2. The following variables, federal conviction of possession of child

pornography, federal conviction of receipt of child pornography, age, race, and time on

supervised release (1 to 5 years, 6 to 10 years, 11 to 20 years, and 21 to 99 years) do not

offer a measure of predictability for projecting the likelihood of recidivism.

Table 11

Binary Logistic Regression

Classification Table[a,b]

			Predicted		
			Did Offender Reoffend/Recidivate?		Percentage
Observed			NO	YES	Correct
Step 0	Did Offender Reoffend/Recidivate?	NO	59	0	100.0
		YES	11	0	.0
	Overall Percentage				84.3

a. Constant is included in the model.

b. The cut value is .500

Variables in the Equation

		B	S.E.	Wald	df	Sig.	Exp(B)
Step 0	Constant	-1.680	.328	26.157	1	.000	.186

Table 12

Comparison of Predictor Variables

Variables not in the Equation

			Score	df	Sig.
Step 0	Variables	Race of Offender	.344	1	.557
		Age of Offender	2.484	1	.115
		Crime of Conviction	3.924	1	.048
		Time on Supervised Release (Years)	.038	1	.846
	Overall Statistics		8.263	4	.082

Block 1: Method = Enter

Omnibus Tests of Model Coefficients

		Chi-square	df	Sig.
Step 1	Step	8.547	4	.073
	Block	8.547	4	.073
	Model	8.547	4	.073

Model Summary

Step	-2 Log likelihood	Cox & Snell R Square	Nagelkerke R Square
1	52.340[a]	.115	.198

a. Estimation terminated at iteration number 20 because maximum iterations has been reached. Final solution cannot be found.

Classification Table[a]

			Predicted		
			Did Offender Reoffend/Recidivate?		Percentage Correct
	Observed		NO	YES	
Step 1	Did Offender Reoffend/Recidivate?	NO	59	0	100.0
		YES	8	3	27.3
	Overall Percentage				88.6

a. The cut value is .500

Table 13

Predictor Variable Results

Variables in the Equation

		B	S.E.	Wald	df	Sig.
Step 1[a]	Race of Offender	-19.736	19874.961	.000	1	.999
	Age of Offender	-.043	.025	3.069	1	.080
	Crime of Conviction	-1.534	.718	4.565	1	.033
	Time on Supervised Release (Years)	.021	.383	.003	1	.956
	Constant	22.547	19874.961	.000	1	.999

Variables in the Equation

		Exp(B)
Step 1[a]	Race of Offender	.000
	Age of Offender	.958
	Crime of Conviction	.216
	Time on Supervised Release (Years)	1.021
	Constant	6192105847

a. Variable(s) entered on step 1: Race of Offender, Age of Offender, Crime of Conviction, Time on Supervised Release (Years).

Correlation Matrix

		Constant	Race of Offender	Age of Offender	Crime of Conviction
Step 1	Constant	1.000	-1.000	.000	.000
	Race of Offender	-1.000	1.000	.000	.000
	Age of Offender	.000	.000	1.000	.126
	Crime of Conviction	.000	.000	.126	1.000
	Time on Supervised Release (Years)	.000	.000	-.016	.067

The analysis yielded results that failed to reject the null hypothesis for most of the independent variables. Therefore, age, race, and time on supervised release (1 to 5 years, 6 to 10 years, 11 to 20 years, and 21 to 99 years) do not offer a measure of predictability

for projecting the likelihood of recidivism. Crime of conviction however, did offer a statistically significant measure of predictability. As this research question contained several different independent variables or potential predictor variables, a binary logistic regression was used to analyze the predictive relationship, if any, the independent variables had with the dependent variable, likelihood of recidivism. The binary logistic regression model estimates the probability of a binary response via one or more independent variables. It affords the assertion that the presence of a factor increases the odds of a certain outcome by a particular factor.

This study examined the relationships between characteristics or demographic information about the offenders and recidivism. The analyzed factors were age, race, crime of conviction, and time on supervised release. To assess the relationship, I ran a binomial logistic regression analysis. This test was used to understand better the dependent variable degree of response in relation to each independent factor or variable. The regression function acts as an estimate necessitating a confidence interval which affords particular levels of predictability. Specific to this study, the odds ratio conveys the likelihood that observed events will take place in both groups.

Crime of conviction turned out to be a significant predictor of recidivism. There are two specific federal crimes identified in this study, the initial offense of possession of child pornography, and receipt of child pornography. Approximately 37% of the study population fell into the initial crime of conviction of possession of child pornography, with this group having a greater occurrence of reoffending.

The first set of output data to be reviewed was the test of model coefficients, or the likelihood ratio—that tests the fit of the analyzed model to the null model. Statistical significance at this juncture would suggest that the model fits the data better than the null model with no predictors. The output score yielded non-significance at .073. The Nagelkerke *R* Square score is .198. The Hosmer and Lemeshow test yielded a significance of .003. This is yet another indication that the model did not fit the data.

The judicial district of initial conviction is the only factor of significance at 5%. The primary objective of this research question was to examine the predictive relationship of these independent variables to that of recidivism. As indicated below, the only predictive variable not listed in the original research question was judicial district. The take away from this result is that neither sentence or time on supervised release appear to have a significant predictive value in terms of future recidivism.
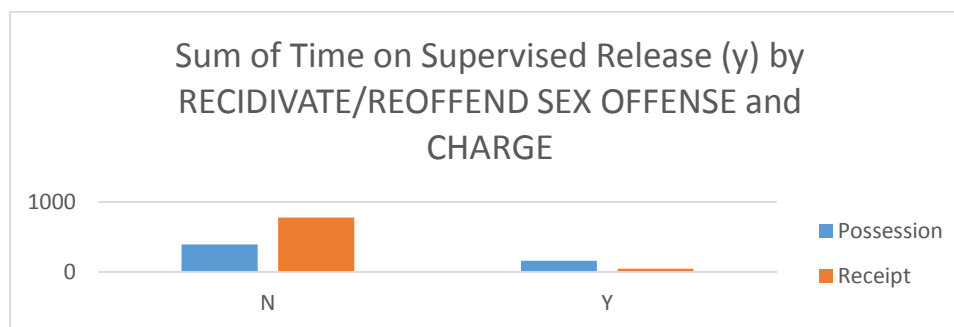

Figure 1. Sum of time on supervised release (y) by recidivate/reoffend sex offense.

As per Figure 1, it is a more detailed appearance of differences between the recidivism occurrences between those with minimal time on supervised release and those with greater supervision. The cumulative total of supervision of those that reoffended was

substantially lower than those that did not. Essentially, the shorter the length of

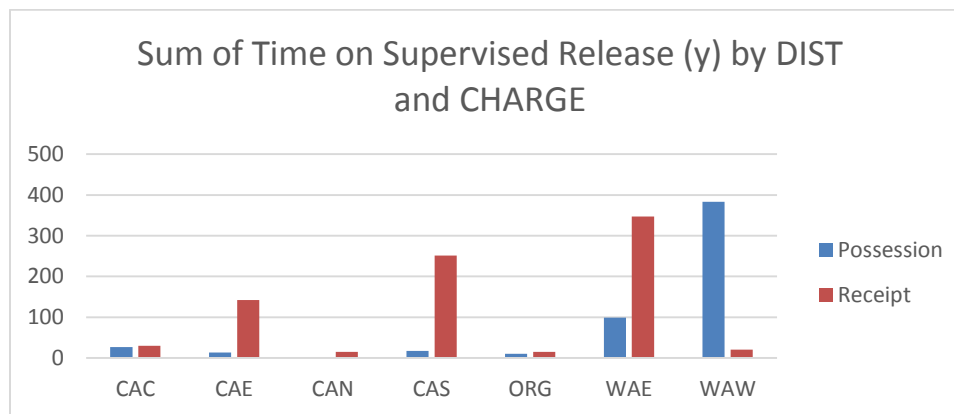supervision for both crimes of conviction, the higher occurrence of recidivism.

Figure 2. Sum of time on supervised release (y) by district and charge.

Chapter 5: Discussion, Conclusions, and Recommendations

Introduction

The purpose of this quantitative study was to evaluate whether there was a significant difference in recidivism among federal child pornography offenders who received a sentence of probation compared to that of a mandatory minimum incarceration sentence. I also examined the predictive relationships between age, race, crime of conviction, and time on supervised release and the likelihood of recidivism among federal child pornography offenders. This addressed a substantial gap in research on the effectiveness of mandatory-minimum sentences on the recidivism rates of federal child pornography offenders. The rationale behind this approach is supported by the tenets of the federal correctional system: retribution, deterrence, incapacitation, and rehabilitation (USSC, 2018). Because the likelihood of recidivism among the two groups in this study are not significantly different, then the treatment or intervention of federal sentences may not be deterring and rehabilitating properly. Results from the binary logistic regression analysis revealed that the only significant predictor of recidivism for this population was the specific crime of conviction. This chapter will address the interpretations of the previously discussed findings, study limitations, future research recommendations, and finally study implications.

Interpretation of Findings

This study yielded two major findings. The first was that mandatory-minimum sentences appear to have no significant impact on recidivism when compared to that of

federal child pornography offenders sentenced to a term of probation. The results of this

study were unable to establish a significant difference in recidivism occurrences that

would support mandatory-minimums as an effective tool towards deterrence and

rehabilitation. This is the reasonable interpretation given that a successfully rehabilitated

previously convicted federal child pornography offender would be deterred from

committing a subsequent offense, let alone a second sexual offense. This finding

confirms the overarching notion that mandatory-minimums are inherently retributive in

nature. Though the goal of this study was not to explore the functional merits of a

retributivist-only system, the results of this study identify a possible shortfall with this

system and its effectiveness in preventing child pornographer recidivism. The federal

correctional system aims to use punishment and ensure public safety by way of

deterrence and effective rehabilitation. However, the application of fundamental

retributivism can be a contamination of due process. Tapered retributivist policies license

unfair and potentially illegitimate rules of criminal procedure (Galoob, 2017). As such,

child pornography FMM sentences may benefit from additional evaluation and alignment

between aims and outcomes.

The second major finding is that crime of conviction is a significant predictor of

recidivism. For several decades due to potential danger and legal liability, mental health

professionals have been required to report patients that they deem dangerous or an

imminent threat (Appelbaum, 1994). In response, the mental health field has adopted

some predictive measures for making these determinations absent overt admissions of

danger (Appelbaum, 1994). Not too long after, criminal justice systems on a global scale found value in violence risk assessment, their sentencing application value, and other crime occurrence predictive systems (Monahan & Skeem, 2016; Singh, Bjørkly, & Fazel, 2016; Skeem & Lowenkamp, 2016). In the case of this study, those who received a term of probation were convicted of possession of child pornography, and those who received a mandatory-minimum sentence were convicted of receipt of child pornography. The federal child pornography offenders of this study population who were sentenced to a term of probation had a higher percentage and occurrence of recidivism compared to those sentenced to a mandatory-minimum.

This study's findings are supported by previous research that has shown sex offender recidivism peaks within the first few years subsequent to conviction and release, then diminishes over time (Zgoba, et al., 2016). Given that the USSC and the federal correctional system contribute to public safety via the incapacitation and rehabilitation of offenders, a term of probation limits the amount and extensiveness of these methods. If an offender is on probation, they are not fully prevented from SRM failures and reoffending. Although probationers are subject to a litany of restrictions and oversight, they are still not within the fully incapacitating confines of a federal correctional institution. Furthermore, rehabilitative treatment for a federal child pornography offender supervised via probation is different and more limited than that of an offender who has been incarcerated for 5 years (Schmucker & Lösel, 2015; Schmucker et al., 2017).

This research has shown that sex offender rehabilitative treatment is more effective in environments that are controlled and monitored, a dynamism more often found in a prison facility. Additionally, FPS child pornography offenders need to immediately acquire coping methods for stemming future criminogenic tendencies, but the pressure of learning how best to reintegrate into society is of equal importance. Again, recidivate tendencies peak within the first few years of intervention, whether the intervention is conviction and probationary release or post-incarceration release. This indicates that the overall acquisition and quantitative examination of recidivism rates among all probationers revealed that the retributivist goals that drive mandatory-minimums for child pornography offenders do not significantly help prevent future crime (Estelle & Phillips, 2018; Galoob, 2017).

This study set out to enhance understanding regarding the effectiveness of federal mandatory-minimums when applied to child pornography offenders. As discussed, success is defined by the absence of subsequent offenses, in short, zero recidivism. The fact that the results of the studied sample revealed no significant difference between the recidivism occurrences in both groups does not necessarily indicate that mandatory minimums are ineffective, as the data cannot confirm their effectiveness. Moreover, mandatory-minimums are seemingly no more effective than a term of probation. Given the lack of literature addressing the triadic interplay of federal sentencing, child pornography offenders and recidivism, this finding extends the understanding of the relationship between these three areas. Finally, and in the context of theoretical

application, the results of this study confirm that although retributivist goals seem to be achieved with mandatory-minimums, they fail to significantly prevent future crime and further harm to the public.

As previously stated, pure retributivism cannot compensate for programmatic or systematic failures and is often contrary to deterrence. Thus, areas of future interest may be avoidance-active pathways, which are offenders' ways of making concerted yet failed efforts because they address symptoms and not problems (Webster, 2005; Yates, Prescott, & Ward, 2010). Further, the avoidance-active pathway defines recidivism avoidance failures in similar to sentencing policy. The mandatory-minimums perform the function of active avoidance by way of incapacitation yet end in the same rate of failure as those given a term of probation because retributivist policies treat the symptom, not the problems that require seemingly more rehabilitation.

Limitations of the Study

The main limitation of this study was the use of secondary data. This precluded any control over data collection methodology and acquisition. Nevertheless, the federal judicial system has literature-supported standardized methods of acquiring court documents, offender information, and conviction data. These methods ensure accuracy certainly with basic information used in this study, such as crimes of conviction, prescribed sentence, offender demographics. The offenders are not only given numerous opportunities to review the amalgam of court documents that chronicle their information but are verbally advised of their contents during several judicial proceedings. As such,

final products such as the secondary data used for this study are safely assumed to be

accurate given that number of opportunities the offender is given to contest the

information contained therein.

Limitations to Generalizability of Results

The intent of this study was to examine and compare a group of federal child

pornography offenders given two types of recidivism, as well as to identify potential

predictors with significant value. However, a clean and exact comparison is impossible

due to the limitation of the FPS population. As such, the comparison had to be conducted

using not only existing counts but expected counts and percentages. Given that the

population represents only three, albeit densely populated states, the generalizability of

the findings may be somewhat limited.

Another limitation is that of crime of conviction versus actual crime committed. It

is a common occurrence for federal offenders to be indicted on multiple charges or

crimes and their final conviction not represent all charges originally posed in the

indictment. This may happen because a jury fails to render a guilty verdict for a specific

charge or more commonly because the offender accepted a plea agreement for a different

possibly lesser charge. Such is the case with federal prosecution and child pornography

offenses. Very often offenders are indicted on charges of Receipt, Distribution,

Advertisement and Possession of Child Pornography. However, as the trial progresses,

the offender may agree to plead guilty on Possession of Child Pornography with the

understanding that the other indicted charges will be dropped. Therefore, the offenders

contained in both groups of this study may have committed more egregious crimes but agreed to accept a conviction for a lesser charge.

Recommendations for Future Research

The fact of the matter is that child exploitation via the pornographic depiction of children is a harsh reality. The aim of this study was to contribute to the existing body of knowledge used to examine federal sentencing policies for potential consideration and perhaps adjustment to better meet punitive and rehabilitative aims. However, the research questions posed and answered in this study can be expounded upon for greater understanding of the interplay between federal incarceration and child pornographer recidivism.

Given that this study was limited to three states and seven federal judicial jurisdictions, the first and most sensible recommendation is to conduct the same analysis for additional if not the remaining states and judicial districts. Although extremely beneficial as is the case when you are able to acquire one-hundred percent of the sample population, the data impediments I encountered will still be there and need to be overcome. To that end, a small dedicated team of researchers could follow the same procedures I did for all fifty states and judicial districts thus making the analysis much more achievable.

Next, it is one thing to determine significant differences and make assessments regarding the independence of variables from one another. However, it is another to know precisely what variable and to what degree failed to keep the offender from

recidivating. I propose alternative research using a qualitative methodology where one on one interview as data collection method of both FPS and FMM child pornography offenders that did and did not recidivate. Essentially, recommendations are made within this study, to interview of all 70 persons which comprised the sample population. For those who did reoffend, an investigation of their individual reasons why they did reoffend is merited. More importantly, their input regarding any level of impact their sentence had on their inability to refrain from a future offense should be explored. Conversely, the researcher poses a similar line of questioning for those offenders that did not reoffend. It is reasonable that over the course of 70 offenders a marked theme or pattern would present itself thus highlighting specific areas for future assessment.

The first two recommendations reveal the present state of FMM efficacy, at least in terms of significance, both on a macro and individual-offender level. In the interest of progressing this topic from understanding to the realm of change, I attest a comparison of post sentence sex offender treatment is highly necessary. If such an analysis revealed a disparity or inconsistency in the mandated treatment, then no amount of federal sentence understanding will completely fix the problem. Ultimately, any recommendation for future research into this topic has to be more than just policy success. This is a violation that failure in terms of recidivism avoidance means exploitation and danger for countless children.

Implications

      This research study quantitatively examined the relationship between mandatory-minimums and the recidivism rates of those federal child pornography offenders given a term of probation. Despite as previously mentioned rehabilitation being a founding tenet in federal sentencing, a mandated exposure period did not appear to significantly reduce the likelihood of reoffending. This study provided new knowledge to the community of federal sentencing policymakers. The USSC as well as federal prosecutors and presiding judges over the various judicial districts in California, Oregon and Washington State will have relevant data to drive future actions and decisions. As previously stated, substantial change will come as a result of scholarship, or evidence-based research on recidivism, and collaborative efforts between those involved in federal sentencing decisions, and sex offender treatment facilitators. This harkens back to the previous recommendations for future research and the dividends for attacking this problem in a comprehensive and holistic scholarly approach.

      A 5-year mandatory-minimum term of incarceration costs approximately $120,000 (Bureau of Prisons, 2012). Therefore, a sentence reduction by three years could cover the cost of a high-quality treatment program. Given that this study found recidivism occurrence and by extension the success of mandatory-minimums to not yield significance, the data supports a potential departure from the existing five-year minimum. Newly reallocated financial resources saved from a shorter three-year minimum would contribute greatly towards additional crime prevention programs. That being said, fiscal

benefits and philosophical alignment with extant policies do not compare to the effect of using past data to reveal extant efficacy for the end goal of saving future children. Protecting the vulnerable is a high calling, and using data to help further the manner of that protection is among the most positive social changes one can make.

Conclusion

In terms of the three states evaluated during the time assessed under the current policy of applying mandatory-minimums, such sentences appear to not have a significant relationship to the reduction of recidivism. Moreover, and highly beneficial for the United States Probation Office, crime of conviction is a significant indicator of future recidivism. The findings in this study, along with the exhaustive review of literature relevant to retributivism, SRM, recidivism, federal sentencing and child pornography suggest that mandatory-minimums are not a substantiated effective tool in reducing future crime. Congressional recommendations by the USSC via new and relevant studies, such as this one, provide insight on the nature of extant policies. Mandatory-minimums were partially instituted on the idea that they would inhibit future offenses, thus enhancing public safety. However, as many scholars have theorized and this study shows, the effectiveness of mandatory-minimums cannot be statistically validated. That being the case, the positive social change conclusion or takeaway is that a review and possible modification to mandatory-minimums may yield less future exploitation of children.

References

Appelbaum, P. S. (1994). *Almost a revolution: Mental health law & the limits of change.* Cary, NC: Oxford University Press.

Ardia, D. S., & Klinefelter, A. (2015). Privacy and court records: An empirical study. *Berkeley Technology Law Journal, 30*(3), 1807-1898. Retrieved from http://scholarship.law.unc.edu

Armstrong, J., & Mellor, D. (2016). Internet child pornography offenders: An examination of attachment and intimacy deficits. *Legal and Criminological Psychology, 21*(1), 41-55. doi:10.1111/lcrp.12028

Asim, J. (2004, June 28). Unfair sentencing a disaster. *The Washington Post*. Retrieved from http://www.washingtonpost.com

Bales, W. D., Bedard, L. E., Quinn, S. T., Ensley, D. T., & Holley, G. P. (2005). Recidivism of public and private state prison inmates in Florida. *Criminology & Public Policy, 4*(1), 57-82. doi:10.1111/j.1745-9133.2005.00006.x

Barnes, C. M., Dang, C. T., Leavitt, K., Guarana, C. L., & Uhlmann, E. L. (2015). Archival data in micro-organizational research: A toolkit for moving to a broader set of topics. *Journal of Management, 44*(4), 1453-1478. doi:10.1177/0149206315604188

Berman, M. (2011). Two kinds of retributivism. In R. A. Duff, & S. Green (Eds.), *Philosophical Foundations of Criminal Law*. doi:10.1093/acprof:oso/9780199559152.001.0001

Bickley, J. A., & Beech, A. R. (2002). An investigation of the Ward and Hudson pathways model of the sexual offense process with child abusers. *Journal of Interpersonal Violence, 17*(4), 371-393. doi:10.1177/0886260502017004002

Bureau of Prisons. (2012). *Federal prison system: per capita costs.* Retrieved from https://www.bop.gov/foia/fy12_per_capita_costs.pdf

Cassell, P. G. (2004). Too severe?: A defense of the federal sentencing guidelines (and a critique of federal mandatory minimums). *Stanford Law Review*, 1017-1048.

Christopher, R. L. (2002). Deterring retributivism: The injustice of 'just' punishment. *Northwestern University Law Review, 96*(3), 843-976. Retrieved from https://digitalcommons.law.utulsa.edu

Cohen, T. H., & Spidell, M. C. (2016). How dangerous are they? An analysis of sex offenders. *Federal Probation, 80*(2), 21-32. Retrieved from https://www.researchgate.net

Cohen, T. H., & VanBenschoten, S. W. (2014). Does the risk of recidivism for supervised offenders improve over time: Examining changes in the dynamic risk characteristics for offenders under federal supervision. *Federal Probation, 78*, 41-56. doi:10.2139/ssrn.2463376

Cohen, T. H., Cook, D., & Lowenkamp, C. T. (2016). The supervision of low-risk federal offenders: How the low-risk policy has changed federal supervision practices with compromising community safety. *Federal Probation*.

Cook, T. (2015). Quasi-experimental design. In *Wiley Encyclopedia of Management*.

doi:10.1002/9781118785317.weom110227

Cornell University Law School, The Legal Information Institute. (2015). *United States Code: 18 U.S. Code § 2252 - Certain activities relating to material involving the sexual exploitation of minors*. Retrieved from https://www.law.cornell.edu/uscode/text/18/2252

Creswell, J. (2009). *Research design: Qualitative, quantitative, and mixed methods approaches* (Laureate Education, custom ed.). Thousand Oaks, CA: Sage.

Creswell, J. W., & Creswell, J. D. (2017). *Research design: Qualitative, quantitative, and mixed methods approaches.* Sage Publications.

Cullen, F. T., Jonson, C. L., & Nagin, D. S. (2011). Prisons do not reduce recidivism the high cost of ignoring science. *The Prison Journal, 91*(3 suppl), 48S-65S. doi:10.1177/0032885511415224

DeLisi, M., Caropreso, D. E., Drury, A. J., Elbert, M. J., Evans, J. L., Heinrichs, T., & Tahja, K. M. (2016). The dark figure of sexual offending: new evidence from federal sex offenders. *Journal of Criminal Psychology, 6*(1), 3-35. doi:10.1108/JCP-12-2015-0030

Donato, R., Shanahan, M., & Higgins, R. (1999). *A cost-benefit analysis of child sex-offender treatment programs for male offenders in correctional services.* Retrieved from http://www.criminologyresearchcouncil.gov.au/reports/23-96-7.pdf

Doyle, C. (2013). *Federal mandatory minimum sentencing statutes.* Retrieved from

http://fas.org/sgp/crs/misc/RL32040.pdf

Estelle, S. M., & Phillips, D. C. (2018). Smart sentencing guidelines: The effect of marginal policy changes on recidivism. *Journal of Public Economics, 164*, 270-293. doi:10.1016/j.jpubeco.2018.05.004

Fagan, J. (1996). The comparative advantage of juvenile versus criminal court sanctions on recidivism among adolescent felony offenders. *Law & Policy, 18*(1-2), 77-114. doi:10.1111/j.1467-9930.1996.tb00165.x

Farabee, D., & Knight, K. (2002). A comparison of public and private prisons in Florida: During-and post-prison performance indicators. *Query Research*. doi:10.1177/0011128707307962

Faul, R., Erdfelder, E., Lang, A. G., & Buchner, A. (2007). G* Power 3: A flexible statistical power analysis program for the social, behavioral, and biomedical sciences. *Behavior research methods, 39*(2), 175-191. doi:10.3758/bf03193146

Faust, E., & Motivans, M. (2015). Sex offenders in the federal correctional system: The consequence of heightened attention on increased certainty and severity of punishment. *Justice Research and Policy, 16*(1), 81-98. doi:10.1177/1525107115593740

Faust, E., Bickart, W., Renaud, C., & Camp, S. (2014). Child pornography possessors and child contact sex offenders: A multilevel comparison of demographic characteristics and rates of recidivism. *Sexual Abuse: A Journal of Research and Treatment*. doi:10.1177/1079063214521469

FindLaw. (n.d.). *Spaziano v. Florida.* Retrieved from http://caselaw.findlaw.com

Fish, M. J. (2008). An eye for an eye: Proportionality as a moral principle of punishment. *Oxford Journal of Legal Studies, 28*(1), 57-71. doi:10.1093/ojls/gqm027

Frankfort-Nachmias, C., Nachmias, D., & DeWaard, J. (2015). *Research Methods in the Social Sciences* (8th ed.). New York, NY: Worth.

Galoob, S. R. (2017, July). Retributivism and criminal procedure. *New Criminal Law Review: An International and Interdisciplinary Journal, 20*(3), 465-505. doi:10.1525/nclr.2017.20.3.465

Goller, A., Jones, R., Dittmann, V., Taylor, P., & Graf, M. (2016). Criminal recidivism of illegal pornography offenders in the overall population-a national cohort study of 4612 offenders in Switzerland. *Advances in Applied Sociology*, 48-56. doi:10.4236/aasoci.2016.62005

Government Publishing Office. (2018, December 20). *Health and human services; Protection of human reserach subjects*. Retrieved from https://www.ecfr.gov

Grossi, L. M. (2017). Sexual offenders, violent offenders, and community reentry: Challenges and treatment considerations. *Aggression and Violent Behavior, 34*, 59-67. doi:10.1016/j.avb.2017.04.005

Hamilton, M. (2011). The efficacy of severe child pornography sentencing: Empirical validity or political rhetoric? *Stanford Law & Policy Review, 22*(2), 545-585.

Holtman, S. (2011). Kant, retributivism, and civic respect. In M. D. White (Ed.), *Retributivism: Essays on Theory and Policy.* New York, NY: Oxford University

Press.

Hunt, K. S., & Dumville, R. (2016). Recidivism among federal offenders: A
comprehensive overview. *United States Sentencing Commission*. Retrieved from
https://www.ussc.gov/sites/default/files/pdf/research-and-publications/research-
publications/2016/recidivism_overview.pdf

Jacobs, A. M., & Weaver, R. K. (2015). When Policies Undo Themselves: Self-
Undermining Feedback as a Source of Policy Change. *Governance, 28*(4), 441-
457. doi:10.1111/gove.12101

James, D. (2017). *Hegel's Elements of the Philosophy of Right: A Critical Guide.*
Cambridge, England: Cambridge University Press.

Kim, B., Spohn, C., & Hedberg, E. C. (2015). Federal sentencing as a complex
collaborative process: judges, prosecutors, judge–prosecutor dyads, and disparity
in sentencing. *Criminology, 53*(4), 597-623. doi:10.1111/1745-9125.12090

Kleinbaum, D. G., & Klein, M. (2012). *Survival analysis: A self-learning text, third
edition (statistics for biology and health)* (3rd ed.). New York, NY: Springer.

Kuhle, L. F., Schlinzig, E., Kaiser, G., Amelung, T., Konrad, A., Röhle, R., & Beier, K.
M. (2017). The association of sexual preference and dynamic risk factors with
undetected child pornography offending. *Journal of sexual aggression, 23*(1), 3-
18. doi:10.1080/13552600.2016.1201157

Laerd Statistics. (2013). *Kaplan-Meier using SPSS statistics*. Retrieved from
https://statistics.laerd.com/spss-tutorials/kaplan-meier-using-spss-statistics.php

Lowe, B. N. (2016, May 1). Punishment without purpose: The retributive and utilitarian

   failures of the child pornography non-production sentencing guidelines.

   Cleveland State Law Review, 65, 231-258. Retrieved from

   http://scholar.google.com/scholar_url?url=http%3A%2F%2Fengagedscholarship.

   csuohio.edu%2Fcgi%2Fviewcontent.cgi%3Farticle%3D3954%26context%3Dcle

   vstlrev&hl=en&sa=T&oi=gga&ct=gga&cd=0&ei=Y3i4WtKkM42pmAHO9aKIB

   w&scisig=AAGBfm39jJp6CxdBxIx-5iTszaxI-6V0CA&nossl=1

Loza, W. (2018). Self-Appraisal Questionnaire (SAQ): A tool for assessing violent and

   non-violent recidivism. *Handbook of Recidivism Risk/Needs Assessment Tools*,

   165-179. doi:10.1002/9781119184256.ch8

McNabb, D. E. (2002). *Research methods in public adminstration and non profit

   management: quantitative and qualitative approaches.* New York, NY: M.E.

   Sharpe.

Mears, D. P., Cochran, J. C., & Cullen, F. T. (2015). Incarceration heterogeneity and its

   implications for assessing the effectiveness of imprisonment on recidivism.

   Criminal Justice Policy Review, 26(27), 691-712.

   doi:10.1177/0887403414528950

Merdian, H. L., Thakker, J., Wilson, N., & Boer, D. P. (2013). The three dimensions of

   online child pornography offending. *Journal of Sexual Aggression, 19*(1), 121-

   132. doi:10.1080/13552600.2011.611898

Meyer, J. F. (2017, September 12). *Retributive justice.* In Encyclopædia Britannica.

Retrieved from https://www.britannica.com/topic/retributive-justice

Miller, T. R., Cohen, M. A., & Wiersema, B. (1996). *Victim costs and consequences: A new look.* Retrieved from https://www.ncjrs.gov/pdffiles/victcost.pdf

Monahan, J., & Skeem, J. L. (2016). Risk assessment in criminal sentencing. *Annual review of clinical psychology, 12*, 489-513. doi:10.1146/annurev-clinpsy-021815-092945

Morgan, G. B., & Hodge, K. J. (2015). A primer on research validity for conducting quantitative studies of the model minority stereotype. In N. D. Hartlep, & B. J. Porfilio, *Killing the model minority stereotype: Asian American counterstories and complicity* (pp. 210-293). Information Age Publishing.

Motivans, M., & Kyckelhahn, T. (2007). Federal prosecution of child sex exploitation offenders. *Bureau of Justice Statistics Bulletin*, 1-8. Retrieved from www.bjs.gov/content/pub/pdf/fpcseo06.pdf

O'Hear, M. M. (2006). The original intent of uniformity in federal sentencing. *Marquette University Law School: Faculty Publications*, 749-817. Retrieved from http://scholarship.law.marquette.edu

Ostermann, M., Salerno, L. M., & Hyatt, J. M. (2015). How different operationalizations of recidivism impact conclusions of effectiveness of parole supervision. *Journal of Research in Crime and Delinquency, 52*(6), 771-796. doi:10.1177/0022427815580626

O'Sullivan, E., Rassel, G. R., & Berner, M. (2008). *Research methods for public*

administrators (5th ed.). New York, NY: Pearson, Longman.

Patten, M. L., & Bruce, R. R. (2007). *Understanding Research Methods: An Essential Overview of the Essentials* (5th ed.). Glendale, CA: Pyrczak Publishing.

Pisegna, N. (2016). Probable cause to protect children: The connection between child molestation and child pornography. *Boston College Journal of Law & Social Justice, 36*, 287-318. Retrieved from http://lawdigitalcommons.bc.edu/cgi/viewcontent.cgi?article=1101&context=jlsj

Primoratz, I. (1990). *Justifying legal punishment (Studies in applied philosopphy).* Amherst, New York: Prometheus Books.

Proulx, J., Perreault, C., & Ouimet, M. (1999). Pathways in the offending process of extra familial sexual child molesters. *Sexual Abuse: A Journal of Research and Treatment, 11*(2), 117–129. doi:10.1177/107906329901100203

Ratcliffe, V. (2015). The internet and access to child pornography: A new (techie) generation of defendants requires a new (individualized) application of the federal sentencing guidelines. *Syracuse Journal of Science & Technology Law, 32*, 103-204. Retrieved from http://jost.syr.edu/wp-content/uploads/JOST-2015-2016-Publication.pdf

Sanchez, M., & Lee, G. (2015). Race, gender, and program type as predictive risk factors of recidivism for juvenile offenders in Georgia. *Journal of Public and Professional Sociology, 7*(2), 1-12. Retrieved from http://digitalcommons.kennesaw.edu/jpps/vol7/iss2/1

Schmidt, A. F., Mokros, A., & Banse, R. (2013). Is pedophilic sexual preference continuous? A taxometric analysis based on direct and indirect measures. *Psychological Assessment, 25*(4), 1146–1153. doi:10.1037/a0033326

Schmucker, M., & Lösel, F. (2015). The effects of sexual offender treatment on recidivism: An international meta-analysis of sound quality evaluations. *Journal of Experimental Criminology, 11*(4), 597-630. doi:10.1007/s11292-015-9241-z

Schmucker, M., Lösel, F., & Schmucker, M. (2017). Sexual offender treatment for reducing recidivism among convicted sex. *Campbell Systematic Reviews*, 5-54. doi:10.4073/csr.2017.8

Seto, M. C. (2017). Research on online sexual offending: What have we learned and where are we going? *Journal of Sexual Aggression, 23*(1), 104-106. doi:10.1080/13552600.2016.1251021

Seto, M. C., & Eke, A. W. (2015). Predicting recidivism among adult male child pornography offenders: Development of the Child Pornography Offender Risk Tool (CPORT). *Law And Human Behavior, 39*(4), 416-429. doi:10.1037/lhb0000128

Seto, M. C., Hermann, C. A., Kjellgren, C., Priebe, G., Svedin, C. G., & Långström, N. (2015). Viewing child pornography: Prevalence and correlates in a representative community sample of young swedish men. *Archives of Sexual Behavior, 44*(1), 67-79. doi:10.1007/s10508-013-0244-4

Singh, J. P., Bjørkly, S., & Fazel, S. (Eds.). (2016). *International perspectives on*

violence risk assessment. New York, New York: Oxford University Press. doi:10.1093/acprof:oso/9780199386291.001.0001

Skeem, J. L., & Lowenkamp, C. T. (2016). Risk, race, and recidivism: predictive bias and disparate impact. *Criminology, 54*(4), 680-712. doi:10.2139/ssrn.2687339

Spljeldnes, S., Jung, H., & Yamatani, H. (2014). Gender differences in jail populations: Factors to consider in reentry strategies. *Journal of Offender Rehabilitation, 53*, 75-94. doi:10.1080/10509674.2013.868387

Steele, C. M. (2015). Web-based child pornography: The global impact of deterrence efforts and its consumption on mobile platforms. *Child abuse & neglect, 44*, 150-158. doi:10.1016/j.chiabu.2014.12.009

Tadros, V. (2011). *The ends of harm: The moral foundations of criminal law.* New York: Oxford University Press.

Tonry, M. (2015). Federal sentencing "reform" since 1984: The awful as enemy of the good. *Crime and Justice, 44*(1), 99-164. doi:10.1086/681666

Trochim, W. M., Donnelly, J. P., & Arora, K. (2015). *Research methods: The essential knowledge base.* Boston, MA: Cengage Learning.

U.S. Census Bureau. (2018, January 23). *Race.* Retrieved from United States Census: https://www.census.gov/topics/population/race/about.html

U.S. Sentencing Commission. (2011). *2011 Report to the Congress: Mandatory Minimum Penalties in the Federal Criminal Justice System.* Washinton D.C.: United States Sentencing Commission. Retrieved from

http://www.ussc.gov/research/congressional-reports/2011-report-congress-

mandatory-minimum-penalties-federal-criminal-justice-system

U.S. Sentencing Commission. (2012). *Recidivism by child pornography offenders.*

Washington, DC: Office of Public Affairs. Retrieved from

http://www.ussc.gov/sites/default/files/pdf/news/congressional-testimony-and-

reports/sex-offense-topics/201212-federal-child-pornography-

offenses/Chapter_11.pdf

U.S. Sentencing Commission. (2015, November). Guidelines Manual, §3E1.1.

U.S. Sentencing Commission. (2017). *FY16 Overview of federal criminal cases.*

Washington, DC: Office of Research and Data. Retrieved from

https://www.ussc.gov/sites/default/files/pdf/research-and-publications/research-

publications/2017/FY16_Overview_Federal_Criminal_Cases.pdf

U.S. Sentencing Commission. (2018). *Federal sentencing: The basics.* Washington, DC:

USSC Office of Research and Data. Retrieved from

https://www.ussc.gov/sites/default/files/pdf/research-and-publications/research-

projects-and-surveys/miscellaneous/201811_fed-sentencing-basics.pdf

U.S. Legal. (2015). *Protection of children against sexual exploitation act law & legal*

definition. Retrieved from http://definitions.uslegal.com/p/protection-of-children-

against-sexual-exploitation-act/

Vartanian, T. P. (2010). *Secondary data analysis.* Oxford University Press.

Walker, J. M. (2011). *Reducing predatory sex offender recidivism through effective*

criminal justice measures (Doctoral dissertation). Walden University. Retrieved

from http://ezp.waldenulibrary.org/login?url=https://search-proquest-

com.ezp.waldenulibrary.org/docview/911792117?accountid=14872

Ward, T., & Hudson, S. M. (1998). The construction and development of theory in the

sexual offending area: A meta-theoritical framework. *Sexual Abuse: A Journal of

Research and Treatment, 10*, 47-63. doi:10.1177/107906329801000106

Ward, T., Louden, K., Hudson, S. M., & Marshall, W. L. (1995). A Descriptive Model of

the Offense Chain for Child Molesters. *Journal of Interpersonal Violence, 10*(4),

452-472. doi:10.1177/088626095010004005

Warner, R. M. (2013). *Applied statistics: From bivariate through multivariate techniques*

(2nd ed.). Thousand Oaks, CA: SAGE Publications.

Webster, S. D. (2005). Pathways to sexual offense recidivism following treatment: An

examination of the Ward and Hudson self. *Journal of Interpersonal Violence,

20*(10), 1175-1196. doi:10.1177/0886260505278532

White, H., & Sabarwal, S. (2014). Quasi-experimental design and methods.

(Methodological Briefs: Impact Evaluation 8) Retrieved from https://www.unicef-

irc.org/KM/IE/img/downloads/Quasi-

Experimental_Design_and_Methods_ENG.pdf

Wilson VanVoon, C. R., & Morgan, B. L. (2007). Understanding power and rules of

thumb for determing sample sizes. *Tutorials in Quantitative Methods for

Psychology, 3*(2), 43-50. doi:10.20982/tqmp.03.2.p043

Wollert, R. (2012). The implications of recidivism research and clinical experience ror

    assessing and treating federal child pornography offenders. *Written Testimony*

    Presented to the US Sentencing Commission. Retrieved from

    http://www.ussc.gov/sites/default/files/pdf/amendment-process/public-hearings-

    and-meetings/20120215-16/Testimony_15_Wollert_2.pdf

Yates, P. M., & Kingston, D. A. (2006). The self-regulation model of sexual offending:

    The relationship between offence pathways and static and dynamic sexual offence

    risk. *Sexual Abuse: A Journal of Research and Treatment, 18*(3), 259-270.

    doi:10.1007/s11194-006-9018-z

Yates, P. M., Kingston, D., & Hall, K. (2003). Pathways to sexual offending: Validity of

    Hudson and Ward's (1998) self-regulation model and relationship to static and

    dynamic risk among treated high risk sexual offenders. In *22nd Annual Research*

    and Treatment Conference of the Association for the Treatment of Sexual Abusers

    (ATSA). St. Louis, Missouri.

Yates, P. M., Prescott, D., & Ward, T. (2010). Applying the good lives and self-

    regulation models to sex offender treatment. *A Practical Guide for Clinicians*.

    Retrieved from

    http://scholar.google.com/scholar_url?url=http%3A%2F%2Fwww.safersociety.or

    g%2Fpress%2Fwp-

    content%2Fuploads%2Fsites%2F3%2F2011%2F02%2FWP145-TOC-

    Introduction.pdf&hl=en&sa=T&oi=gga&ct=gga&cd=1&ei=0_y1WuzqJIiGmwH

Gl5joAw&scisig=AAGBfm0rYRLn2myUnoUGCkX3XDtTK4B_

Zgoba, K. M., Miner, M., Levenson, J., Knight, R., Letourneau, E., & Thornton, D.

(2016). The Adam Walsh Act: An examination of sex offender risk classification

systems. *Sexual Abuse, 28*(8), 722-740. doi:10.1177/1079063215569543