

CHARACTERISTICS OF CHILD PORNOGRAPHERS UNDER FEDERAL SUPERVISION
IN THE STATE OF NORTH DAKOTA

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ABSTRACT

Currently, it is estimated that there are over 45 million child pornographic images and videos on the internet. The purpose of the current study is to record the characteristics of those convicted of accessing, distributing, and/or producing child pornography in the State of North Dakota. To examine this phenomenon, the District of North Dakota Federal Probation and Pretrial Supervision Service records have been disseminated. Overall, the results indicate that child pornographers in North Dakota mirror those around the globe. In addition, the sample of child pornographers was compared to other sexual offenders and general offenders through bivariate analyses. There were statistically significant differences found between both groups.

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TABLE OF CONTENTS

ABSTRACT	iii
ACKNOWLEDGEMENTS	iv
LIST OF TABLES	ix
CHAPTER I: INTRODUCTION	1
Sex Offending in the United States	1
Prevalence of Sex Offending.....	1
Public Perception.....	3
Legislation for Sex Offenders	4
Offender Typologies.....	6
Rapists	6
Child Sexual Abusers	7
Prevalence of Child Sexual Abuse	9
Current Study.....	10
Looking Ahead	11
Research Questions	11
CHAPTER II: LITERATURE REVIEW	12
The Expanse of the Web and Child Pornography	12
Prevalence of Child Pornography.....	14
Widespread Internet Usage.....	15
Brief History	17
What Constitutes Child Pornography	18
Capturing Child Pornographers	21
Effects of Child Pornography	23
Effects on Victims	23

Effects on Offenders	26
Who Accesses Child Pornography?	27
Demographic Characteristics.....	27
Age.....	27
Gender	29
Race	31
Marital Status.....	32
Parental Status	33
Employment.....	33
Educational Attainment	34
Psychological Characteristics.....	34
Mental Health	34
Minimizing Blame.....	36
Substance Abuse.....	37
Childhood Sexual Abuse	38
Offending Characteristics.....	38
Prior Criminal History	38
Recidivism	39
Conclusion.....	41
CHAPTER III: METHODS	42
Description of Sample	42
Data.....	43
Measures.....	43
Analysis	46
CHAPTER IV: RESULTS	47

Results for Research Question One.....	47
Age.....	47
Gender	48
Race	48
Marital Status.....	49
Educational Attainment	49
Presentation of Mental Health	50
Prior Criminal History	50
Summary for Research Question One	51
Results for Research Question Two	51
Age.....	51
Gender	52
Race	53
Marital Status.....	54
Educational Attainment	54
Presentation of Mental Health	55
Prior Criminal History	56
Summary for Research Question Two.....	56
Results for Research Question Three	57
Age.....	57
Gender	58
Race	58
Marital Status.....	59
Educational Attainment	59
Presentation of Mental Health	60

Prior Criminal History	61
Summary for Research Question Three.....	61
CHAPTER V: CONCLUSION	63
Discussion.....	63
Research Question One	63
Research Question Two.....	67
Research Question Three.....	69
Limitations.....	72
Conclusion.....	73
REFERENCES	74

LIST OF TABLES

<u>Table</u>	<u>Page</u>
1. Sentencing Table Utilizing Criminal History Roman Numerals.....	46
2. Child Pornographers Age Demographic Information	48
3. Child Pornographers Gender Demographic Information	48
4. Child Pornographers Race Demographic Information	49
5. Child Pornographers Marital Status Information	49
6. Child Pornographers Educational Attainment Information.....	50
7. Child Pornographers Mental Health Information.....	50
8. Child Pornographers Criminal History Information.....	51
9. Comparison of Ages between General Offenders and Child Pornographers	52
10. Comparison of Gender between General Offenders and Child Pornographers.....	53
11. Comparison of Race between General Offenders and Child Pornographers	53
12. Comparison of Marital Status between General Offenders and Child Pornographers.....	54
13. Comparison of Educational Attainment between General Offenders and Child Pornographers.....	55
14. Comparison of Mental Health between General Offenders and Child Pornographers.....	55
15. Comparison of Criminal History between General Offenders and Child Pornographers.....	56
16. Comparison of Ages between Child Pornographers and Other Sex Offenders.....	57
17. Comparison of Gender between Child Pornographers and Other Sex Offenders	58
18. Comparison of Race between Child Pornographers and Other Sex Offenders.....	59
19. Comparison of Marital Status between Child Pornographers and Other Sex Offenders	59
20. Comparison of Educational Attainment between Child Pornographers and Other Sex Offenders	60

21.	Comparison of Mental Health between Child Pornographers and Other Sex Offenders	60
22.	Comparison of Criminal History between Child Pornographers and Other Sex Offenders	61
23.	Comparison of Findings Between Current Study and Past Literature	65

CHAPTER I: INTRODUCTION

This study focuses on the characteristics of child pornographers in the state of North Dakota. In order to understand child pornography, sex offending must be addressed. Child pornography is one type of sex offense.

Sex Offending in the United States

Sex offending is a nationwide problem, with 131,560 documented rapes reported to law enforcement in the year of 2018 (Federal Bureau of Investigation, 2019). The Sex Offender Registration and Notification Act, found in Title I of the Adam Walsh Child Protection and Safety Act of 2006 (Public law number 109-248) defines a sex offender as, “a person who was convicted of a sex offense.” A federal sex offense includes the following: aggravated sexual abuse and rape, sexual exploitation of minors, abusive sexual contact crimes, sexual slavery or human trafficking, federal pornography violations, repeated sex offender crimes, federal sex registry failure to notify crimes, selling or buying of children, and prostitution (Nathan, 2018; U.S. Department of Justice, 2007). There are few formal data collection tools that compile prevalence data for sexual offenses nationally, two are the Uniform Crime Report (UCR) and the National Crime Victimization Survey (NCVS).

Prevalence of Sex Offending

The UCR found that reported rapes increased 2.8 percent from the year 2017 to 2018 (Federal Bureau of Investigation, 2019). The NCVS found similar results with self-reported sexual victimization increasing from 2017 to 2018. Specifically, 5,612,670 incidences of sexual assault/rape were self-reported in 2017, while 6,385,520 incidences of rape/sexual assault were reported in 2018 (Morgan & Oudekerk, 2019). In terms of rates, the NCVS found that 1.4

victimizations occurred per 1,000 persons 12 years of age or above in the year 2017 and rose to 2.7 victimizations per 1,000 persons in the year 2018 (Morgan & Oudekerk, 2019).

Despite the rise in documented reports of sexual offenses, there are still a large number of sex offenses that go undocumented (Wiseman, 2015; Truman & Planty, 2012). One factor that contributes to accurate counts of sex offenses is low levels of reporting (Wiseman, 2015; Truman & Planty, 2012). Low levels of reporting can be due to a variety of factors. One factor may be that victims often feel guilt and/or shame (De Francis, 1969; De Young, 1982). Guilt and/or shame could be a result of the offender blaming them for the assault, the offender being a family member or someone well-known to the victim, and/or the victim blaming themselves for not doing more to stop the assault (Finkelhor & Browne, 1991). Another factor could be the limitations of the UCR itself. The UCR acquires its data through voluntary submission of police departments (U.S. Department of Justice, 2019). Police departments that do not report to the UCR do not have their counts of sexual offenses included. In addition, sexual offenses reported to police departments that are considered unfounded by officers do not get reported to the UCR.

Preventative legislation against offenders could be another factor attributed to lower levels of reporting for sexual offenses. For example, one preventative statute that was created was the sex offender registry. The sex offender registry was largely created due to fear mongering that occurred after the molestation and murder of 11-year-old Jacob Wetterling (Office of Sex offender Sentencing, Monitoring, Apprehending, Registering, and Tracking, n.d.). Sex offender registries help track sex offenders' movements, such as employment and current address for the benefits of law enforcement and the public (Lees and Tewksbury, 2006). In 2016, the National Center for Missing and Exploited Children reported approximately 857,979

individuals on sex offender registries within the United States (National Center for Missing and Exploited Children, 2017).

Public Perception

Despite having sex offender registries to enhance public safety, the general public remains fearful of sex offenders' presence (Levenson, Brannon, Fortney, & Baker, 2007). For example, people still hold negative beliefs about sex offenders' abilities to resist recidivating (Levenson et al., 2007). These negative beliefs are documented in a study conducted in Melbourne, Florida that analyzed community members beliefs about sex offenders (Levenson et al., 2007). Of the 193 community members sampled, 75 percent believe any given sex offender would recidivate and 77 percent of the participants believe that sex offense rates are on the rise (Levenson et al., 2007). Additionally, a majority of the sample were skeptical about the effects of treatment (Levenson et al., 2007).

Another example that demonstrates the public's concern over sex offenders is a 2010 survey study completed by the U.S. Department of Justice, Center for Sex Offender Management (CSOM). The study comprised of 1,005 individuals nationwide and addressed the participants knowledge of sex offenders (Center for Sex Offender Management, 2010). Like Levenson et al. (2007), the Center for Sex Offender Management found that 72 percent of the sample believed over half of all convicted sex offenders would recidivate (Center for Sex Offender Management, 2010). Public opinion is largely informed by claims making and the media.

In 2002, a study aimed at identifying the extent media plays on public perceptions of sex offenders and the accuracy of reporting on the topic was completed (Proctor, Badzinski, & Johnson, 2002). The findings showed that the media does not accurately report empirical evidence and amplifies common myths surrounding sex offenders (Proctor et al., 2002). This has

led the public to pressure law makers to create legislation that directly addresses the fears and misperceptions the public has towards sex offenders. The following section illustrates how public perception has impacted legislation.

Legislation for Sex Offenders

Many policies have been put into place to alleviate public fear surrounding sex offenders. The Jacob Wetterling Crimes against Children and Sexually Violent Offender Registration Act of 1994 was in response to the public outcry from the loss of an 11-year-old boy (Public law number 103-322). The young boy, Jacob Wetterling, was on his bike when he was kidnapped, molested, and murdered (Human Rights Watch, 2007). The Registration Act made it mandatory for each state to create its own sex offender registry (Public law number 103-322). Any individual that was found guilty of sexually abusing a minor or violently sexually abusing an adult was mandated to enlist on the registry (Public law number 103-322). In addition, the legislation required sex offenders to update law enforcement on their current address for 10 years post release (Public law number 103-322). Law enforcement had the authority to release this information to members of the public, however it was up to their discretionary powers (Legislative History of Federal Sex Offender Registration and Notification, n.d.).

In 1996, the optional disclosure of dangerous sex offenders became mandatory through Megan's Law (Bonnar-Kidd, 2010; Lees & Tewksbury, 2006; Public law number 104-145). However, the determination of whether a sex offender was an imminent threat to the public in which they resided was still discretionary (Bonnar-Kidd, 2010; Public law number 104-145). The Pam Lychner Sexual Offender Tracking and Identification Act was also passed in 1996 (Public law number 104-236). The Act created a national sex offender registry for law enforcement officials to utilize and was maintained by the Federal Bureau of Investigation (Public law

number 104-236). The main purpose of the registry was to ensure sex offenders could not move from one state to another state to avoid registering (Public law number 104-236). However, sex offenders did not only move states for registry avoidance. Sex offenders may also move from one state to another for education or employment opportunities.

In order to combat this potential problem, Congress addressed this point by passing the Campus Sex Crimes Prevention Act within the Victims of Trafficking and Violence Protection Act of 2000 (Public law number 106-386). The act required campus security policies to be displayed and for information on known sex offenders to be easily accessible to students (Public law number 106-386). In addition, the act required sex offenders to disclose their registration status to states in which they were attending or working at a college (Public law number 106-386).

Beginning in 2003, states were required to have their sex offender registries publicly available online under the Prosecutorial Remedies and Other Tools to end the Exploitation of Children Today Act (PROTECT Act) (Public law number 108-21). The bill advanced the Amber Alert system, increased severity of punishment with sentencing guidelines, prohibited computer-generated child pornography, along with many more enhancements to keep children safe (Public law number 108-21).

As the internet expanded and people became more fearful of sex offenders, more security was necessary. One of the most influential safeguards established was The Adam Walsh Act of 2006. This act created tiers within the established sex offender registry that divided offenders by the severity of their crime (Public law number 109-248). The higher the tier, the more frequently the reporting and the longer the duration of reporting by the offender (Public law number 109-248). In addition, the federal government widened the range of convictions that required

registration (Public law number 109-248). If an offender failed to register, punishment in the form of payment or incarceration was mandated.

Other safeguards that extended beyond the borders of the United States were the Keeping the Internet Devoid of Predators Act (KIDS Act) of 2008 and International Megan's Law of 2016. The KIDS Act of 2008 required sex offenders to disclose any identifiers used on the internet, such as email addresses or usernames (Public law number 110-400). In 2016, International Megan's Law required registered sex offenders to disclose any plans of international travel 21 days prior to their departure (Public law number 114-119). Some legislation, such as the KIDS Act focused on particular types of sex offenders, which is why it is important to differentiate between them.

Offender Typologies

Offender typologies are social constructs that may differ within the research community. Some research may not distinguish between sex offenders and other offenders at all. However, for the sake of this research study, typologies will be addressed and differentiation between sex offenders and other offenders will be made.

Rapists

Typologies have been developed for sex offenders. One example of a sexual offender is a rapist. Rapists share similarities with violent offenders and often commit other crimes in addition to rape (Harris, Mazerolle, & Knight, 2009). Rapists' victims are typically female and are often known by the offender (Bruinsma, 1995). This could be related to finds that suggest rapists have negative impressions of women and their roles in sexual activity (Polaschek, Ward, & Hudson, 1997). Rapists most often offend aggressively and when confronted, place blame on the victim

(Polaschek et al., 1997). Placing blame on the victim could also be a result of antisocial tendencies (Langstrom, Sjostedt, & Grann, 2004).

Empirical studies have found different types of rapists. Some offenders rape to reassure themselves of the power that they hold over others (Doran, Lobanov-Rostovsky, & Simons, 2015). They typically want to feel this power reassurance because they feel inadequate themselves. Other rapists seek to assert power over others because of impulsivity issues. Power assertive rapists are typically much more aggressive than rapists who seek power reassurance. Anger retaliated rapists are not physically aggressive like power reassurance or power assertive rapists. The anger retaliatory rapist instead aims to degrade victims (Doran et al., 2015). The most aggressive rapists are known as sadistic (Doran et al., 2015; Hanson & Morton-Bourgon, 2004). Sadistic rapists are the most likely to murder and/or torture their victims (Doran et al., 2015; Hanson & Morton-Bourgon, 2004). Another type of sexual offender is a child sexual abuser.

Child Sexual Abusers

Most of the notable sex offender legislation addresses child sexual offenders. Child sex offenders are those who abuse individuals under the age of 18 (18 USC§ 2256A). These offenders do not see their abuse as victimization, but as a consensual relationship (Groth, 1983). However, it is important to note that not all child sexual abusers are sexually attracted to children (Doran et al., 2015). The rationale behind child sexual abuse is largely dependent on whether they are fixated or regressed child sexual abusers.

A fixated child sexual abuser is sexually attracted to children, otherwise known as a pedophile (Groth, Hobson, & Gary, 1982). Pedophiles feel socially drawn to children, rather than adults (Groth et al., 1982). By offending, the child sexual abuser is aiming to appease their

sexual desires, usually with a male child (Conte, 1991; Priest & Smith, 1992). A regressed child sexual abuser would typically select a friend or sexual partner of their own age; however, when stress presents itself, they turn to abusing children sexually (Groth et al., 1982; Simon, Sales, Kasniak, & Kahn, 1992). Regressed abusers typically select females or adolescents within their own family (Simon et al., 1992). Whether an abuser chooses a victim within their own family or outside of their family is another way child sexual abusers and other typologies can be differentiated.

Intrafamilial and Extrafamilial

Intrafamilial offenders choose victims that are relatives. Whereas, extrafamilial offenders choose victims from outside of their families (Rice & Harris, 2002). Intrafamilial offenders typically have less psychopathic tendencies and show less hostility towards their victims than extrafamilial offenders (Rice & Harris, 2002). The victims intrafamilial sex offenders prefer are females and are typically older than victims of extrafamilial sex offenders (Rice & Harris, 2002). In addition, intrafamilial sex offenders are found to have fewer victims and are less likely to recidivate (Rice & Harris, 2002). This could be due to the fact that extrafamilial sex offenders more often struggle with self-regulation, substance abuse, antisocial personality disorder, intimacy deficits, and negative peer influences (Prentky, Knight, Rosenberg, & Lee, 1989). Child sexual offenders can be differentiated further into two distinct categories: hands on offenses and hands-off offenses.

Hands-On and Hands-Off

Hands-on and hands-off child sex offenses are also known as contact and non-contact sex offenses. A hands-on child sexual offense occurs when physical contact is made between the victim and offender (Townsend & Rheingold, 2013). Some examples of hands-on offenses could

be molestation or the production of child pornography. Whereas, a hands-off sexual offense would not involve any physical contact between the victim and offender (Townsend & Rheingold, 2013). Examples of hands-off offenses would include watching child pornography on the internet or exhibitionism.

Prevalence of Child Sexual Abuse

Both hands-on and hands-off child sex offenses are prevalent within the United States. Child protective services confirmed 89,500 cases of child sexual abuse in the year 2000 (O'Neil Bona, 2006). A meta-analysis analyzing six studies of hands-on child sexual offending found that approximately one in ten minors will experience contact sexual abuse by the time they reach age 18 (Townsend & Rheingold, 2013). That same study found that 1 of every 7 girls and 1 of every 25 boys had been victims of hands-on child sexual abuse (Townsend & Rheingold, 2013). Similarly, a study by Finkelhor and colleagues (2014) found that 1 of every 4 girls and 1 of every 20 boys had been victims of child sexual abuse. According to Townsend and Rheingold (2013), 10.7 percent to 17.4 percent of girls and 3.8 percent to 4.6 percent of boys experience contact sexual abuse. Pereda et al. (2009) and the National Center for Victims of Crime (2018) found comparable results with 5 to 10 percent of males and 19 to 20 percent of females experiencing contact sexual abuse.

The empirical data of the prevalence of non-contact sexual offending is limited compared to the data on contact sexual offending. However, over 90 percent of children that are sexually exploited over the internet have also been victims of contact sexual abuse (National Institute of Justice, 2007). This finding could have been anticipated as those who sexually abuse children often participate in both contact and non-contact offending (Wolak, Finkelhor, & Mitchell, 2005). The National Juvenile Online Victimization Study (N-JOV) employed mixed methods

through 2,574 mailed surveys and 429 detailed phone interviews with law enforcement officials on the topic of child pornography offenders and found that 1 in every 5 contact sexual offenders also participated in child pornography (Wolak et al., 2005). Child pornography is one type of hands-off or hands-on child sexual abuse that has grown in prevalence in recent years and has been increasingly targeted through legislation (Keighley, 2017; Sternberg, 2001).

Current Study

Understanding the child sexual offending population, specifically the population of child pornographers, can help identify characteristics of this population which can be used to prevent and respond to child sexual abuse. The current project will analyze individuals who have been federally convicted of downloading, distributing, and/or producing child pornography in North Dakota. The project will first examine characteristics of child pornographers under federal supervision in North Dakota to see if patterns are similar to previous empirical research on characteristics of child pornographers. Next, this project will compare child pornographers under federal supervision in North Dakota to general offenders to note any differences in the population. Lastly, this project will perform a comparative analysis between those under federal supervision for child pornography versus those who are under federal supervision for a different sex offense.

For the purpose of this study, child pornography will be defined by federal government statute in Section 2256 of Title 18 as:

“Any visual depiction of sexually explicit conduct involving a minor. Visual depictions include photographs, videos, digital or computer-generated images indistinguishable from an actual minor, and images created, adapted, or modified, but appear to depict an identifiable, actual minor. Undeveloped film, undeveloped videotape, and electronically

stored data that can be converted into a visual image of child pornography are also deemed illegal visual depictions under federal law” (United States Department of Justice, 2017).

The federal definition was selected due to the variation of child pornography definitions by state. In addition, many cases of child pornography are convicted at the federal level, which is where the data for this study originated. Characteristics of child pornographers include demographic characteristics: age, gender, race, marital status, and education level; psychological characteristics: presentation of mental health, and offending characteristics: criminal history. The data used in this study came from the District of North Dakota Federal Probation and Pretrial Supervision Service.

Looking Ahead

The following chapter will review prior literature on the topics related to this project. The third chapter will discuss the methods that will be employed in this study. The fourth chapter will report results for each research question. The fifth chapter will expand on the results and discuss limitations and recommendations related to study findings.

Research Questions

1. What are the demographic, psychological, and offending characteristics of those under federal supervision for child pornography in the state of North Dakota?
2. What are the differences in characteristics between those under federal supervision for child pornography versus a general offense?
3. What are the differences in characteristics between those under federal supervision for child pornography versus a different sex crime?

CHAPTER II: LITERATURE REVIEW

As internet technology has expanded, access to child pornographic materials has also expanded. The expansion of child pornographic material is exemplified through the approximately one million child pornographic images identified on the internet each month (Bursztein et al., 2017). Legislation to combat child pornography has followed.

The Expanse of the Web and Child Pornography

The World Wide Web was designed in 1989 by Tim Berners and was accessible to the public by 1991 (Tim Berners-Lee, 2019). The World Wide Web gave way to browsers and domains that allowed the easy retrieval of information, images, files, and more. Internet accessibility has many benefits; however, it can also have its disadvantages. Berners himself expressed, “We demonstrated that the Web had failed instead of served humanity, as it was supposed to have done, and failed in many places” (Brooker, 2018).

One place the Web has failed to serve humanity, particularly the vulnerable, is the increased ability to easily download, distribute, and produce child pornography. For example, in 1999, less than a decade after the creation of the World Wide Web, Operation Avalanche commenced (U.S. Department of Justice, 2010). Operation Avalanche aimed to disassemble Landslide Productions Inc. of Fort Worth, Texas (U.S. Department of Justice, 2010). The Landslide website supplied its subscribers with over 5,000 web addresses that housed child pornography (U.S. Department of Justice, 2010). Subscribers to the Landslide website paid \$29.95 per month for access to images and videos of child sexual abuse (U.S. Department of Justice, 2010). Federal search warrants identified over 200,000 subscribers from 60 countries utilizing the site (U.S. Department of Justice, 2010). Operation Avalanche demonstrates the rapid expansion, capabilities, and adaptability of the web after only nine years of existence. In 2019

the world's knowledge of technology has continued to expand and the internet has become increasingly user friendly.

The National Center for Missing and Exploited Children (NCMEC) created a CyberTipline in March of 1998 (Bursztein et al., 2017). From the date it was founded till September 30th, 2017 the CyberTipline had received over 23.4 million reports of child pornography. The most alarming observation from the reports is that 9.6 million of them were disclosed in 2017. This means that nearly 40 percent of all child pornographic reports in those 19 years came from 2017 alone. The sharp increase in reporting could be due to increased awareness versus increased production. However, with 84 percent of child pornographic images reported to NCMEC only one time, it is evident that new content is generated often (Bursztein et al., 2017).

One reason child pornographers may feel emboldened to generate, access, and distribute pornographic material is the lack of visibility (Foley, 2002). Internet users can remain anonymous by hiding behind a screen (Foley, 2002). Prior to internet access, individuals had to physically possess and distribute child pornographic images through face-to-face contact. Being caught physically possessing pornographic images could have come with discrimination and shame that may have deterred individuals from committing this crime. With the invention of the internet and smartphones, predators now can carry thousands of child pornographic images and videos in a discrete, condensed form (Todorov, 2017). Individuals with internet access also have the capability to delete their web history, making it appear as though they did not access pornographic content (McDonald & Cranor, 2010).

Individuals with an even greater knowledge of technology are able to use encryption to disguise their internet usage (Sassani, Alkorbi, Jamil, Naeem, & Mirza, 2020). Encryptors can

conceal information on the web by changing it into deceptive codes that only they or others with knowledge of the encoding can understand and decrypt (Sassani et al., 2020). This makes it difficult for third parties, such as law enforcement, to gain access to encrypted information being housed within a device that has been encrypted (U.S. Department of Justice, 2016).

Accessing the dark web, an encrypted network that cannot be accessed through typical search engines, is one way that encryption proves advantageous (Kharpal, 2018). Tor is one anonymous browser that is commonly used to obtain access to the dark web (Kharpal, 2018; United States Department of Justice, 2016). The anonymity provided by the dark web allows users to buy and sell illegal items such as drugs, firearms, stolen identification, child pornography, etc. (Kharpal, 2018). The desire for anonymity is likely due to the illegality of child pornography.

The United States is one of 21 countries with comprehensive child pornography laws (The Koons Family Institute on International Law & Policy, 2018). As of 2018, child pornography was still not criminalized in 16 countries (The Koons Family Institute on International Law & Policy, 2018). Despite child pornography's illegality, it remains prevalent.

Prevalence of Child Pornography

The National Center for Missing and Exploited Children was established in 1984 (About NCMEC, 2020). Since then, the organization has analyzed over 293 million pornographic videos and images of children that are housed on the internet and have assisted law enforcement in identifying over 17,000 children that were victims of child exploitation (About NCMEC, 2020). Studies have found negative physical and psychological impacts on victims of child pornography (Martin, 2016). Child pornography is not only harmful to victims behind the camera lens, but also to victims who are exploited without their knowledge (Martin, 2016). Congress cited that

child pornography has a “deleterious effect on all children by encouraging a societal perception of children as sexual objects” (18 U.S.C. § 2251, 11(A)).

Tor, a browser that provides anonymity to users has been found to host numerous child pornographic websites (United States Department of Justice, 2016). An operation conducted by the Federal Bureau of Investigation discovered over 1.3 million images of child sexual abuse on one Tor website alone (United States Department of Justice, 2016). Another investigation of Tor led agents to find a pornographic website housing explicit images of children with over 195,000 registered users and 100,000 users who had viewed the website within the last 12 days (United States Department of Justice, 2016). The growing prevalence of child pornography can likely be attributed to the expanse of technology, specifically the internet.

Widespread Internet Usage

In 2016, the American Community Survey distributed by the United States Department of Commerce in coalition with the United States Census Bureau aimed to capture the magnitude of internet usage within the United States (Ryan, 2018). The survey found that approximately 89 percent of households within the United States had a computer and/or smartphone in their possession, with over 80 percent of those households having access to high-speed internet (Ryan, 2018). Further, there were approximately 245 million internet users in 2016 (Roser, Ritchie, and Ortiz-Ospina, 2015). Internet users are defined as individuals who had accessed the internet through any capable device within three months of the survey intake date (Roser et al., 2015). Never before have the American people had such widespread access to high-speed internet (Ryan, 2018). One way that people are able to connect with each other through the internet is by accessing peer-2-peer (P2P) sharing networks.

Peer-2-Peer (P2P) network sharing occurs when interconnected networks transfer data with one another (Lisk, 2019). In order for this connection to occur an individual will download software such as BitTorrent or Gnutella (Wolak, Liberatore, & Levine, 2014). Typically, people will use P2P sharing when the files they desire to distribute are large, such as when they contain images and/or videos (Wolak et al., 2014). Each peer that a computer is connected with is also known as a node (Lisk, 2019). When a file or data is transferred from one node to another node, each of them will store an identical copy of the shared information, which helps to explain the prevalence of identical child pornographic images and/or videos circulating the web (Wolak et al., 2014).

On peer-2-peer networks there is no central storage unit. This means that all connected devices are able to act both as clientele and owner (Lisk, 2019). Each peer is able to create folders that become available to anyone who is also a part of that network. These folders allow child pornographers to share images or videos they already possess and download files from other child pornographers within the network (Wolak et al., 2014).

Historically, peer-2-peer network sharing has been known for illegal transfers of media, such as movies or music (Wolak et al., 2014). However, it is becoming a growing phenomenon in child pornography (U.S. Department of Justice, 2010). In 2010, the United States Department of Justice declared that P2P sharing sites are very popular among child pornographers. Over half of all child pornographers arrested in 2009 had utilized P2P networking sites to distribute or receive child pornographic images or videos, compared to only 4 percent of child pornographers in 2000 (Wolak, Finkelhor, & Mitchell, 2012). P2P networks may be popular with child pornographers because there is no cost associated, it can be accessed from anywhere, thousands

of child pornographic images and videos can be shared within a short time span, and it provides anonymity (Wolak et al., 2014). With anonymity, comes security for child pornographers.

Brief History

United States law makers have recognized the growth of web-based child pornography and have created legislation to combat it. In 1977, the Protection of Children Against Sexual Exploitation Act was passed by congress (H.R. 9357, 1977). This Act made it illegal for individuals under the age of 16 (minors) to appear in sexually explicit depictions (H.R. 9357, 1977). The Protection of Children against Sexual Exploitation Act was enhanced when congress passed the Child Protection Act of 1984 (Public law number 98-292). The Child Protection Act of 1984 broadened the definition of sexually explicit conduct and enhanced the Protection of Children Against Sexual Exploitation Act of 1977 by expanding the definition of “minor” to include 17- and 18-year old’s (Public law number 98-292).

In 1988, Congress spoke to the increasing number of child pornographic images flooding the internet by introducing the Child Protection and Obscenity Enforcement Act (H.R. 3889, 1988). This statute would have made it illegal for child pornographic images to be transmitted over the internet, however it failed to be passed by the House of Representatives (H.R. 3889, 1988). Another act aimed at restricting advancements in technology related to child pornography was The Child Pornography Prevention Act (CPPA) of 1996 (Sternberg, 2001). The CPPA broadened the definition of child pornography to include computer-generated child pornography, otherwise known as “virtual child pornography” (Sternberg, 2001).

Supreme Court case *Ashcroft v. Free Speech Coalition* (2002) challenged the CPPA based on first amendment rights to free speech and ruled in Ashcroft’s favor by determining the CPPA was too broad in nature (*Ashcroft v. Free Speech Coalition*, 2002). Additionally, the

Supreme Court ruled that virtual child pornography was not obscene under the ruling of *Miller v. California* and did not exploit real children under the ruling of *Ferber* (*Ashcroft v. Free Speech Coalition*; *New York v. Ferber*; *Miller v. California*). Congress was quick to react to *Ashcroft v. Free Speech Coalition* (2002) ruling. In 2003, Congress passed the Prosecutorial Remedies and Other Tools to end the Exploitation of Children Today Act (PROTECT ACT) that once again made computer-generated imagery of minors performing sexually explicit acts illegal (Public law number 108-21). These Acts have formed the current federal definition of child pornography.

What Constitutes Child Pornography

The federal definition of child pornography remains consistent throughout all 50 states. State statutes differ in conceptualization of child pornography. As noted above, child pornography is defined today by the federal government in Section 2256 of Title 18 as:

“Any visual depiction of sexually explicit conduct involving a minor. Visual depictions include photographs, videos, digital or computer-generated images indistinguishable from an actual minor, and images created, adapted, or modified, but appear to depict an identifiable, actual minor. Undeveloped film, undeveloped videotape, and electronically stored data that can be converted into a visual image of child pornography are also deemed illegal visual depictions under federal law” (United States Department of Justice, 2017).

U.S. Code Title 18 § 2256 goes onto elaborate in section A, the term sexually explicit includes, “sexual intercourse, including genital-genital, oral-genital, anal-genital, or oral-anal, whether between persons of the same or opposite sex; bestiality, masturbation, sadistic or masochistic abuse; or lascivious exhibition of the anus, genitals, or pubic area of any person”. Lascivious

exhibition of the anus, genitals, or pubic area of any person means that an image or video with a specific focus on these areas constitutes child pornography (18 USC§ 2256B). The term minor is an individual up to 18 years of age (18 USC§ 2256A). Whether or not the minor provided consent to take part in the action(s) being contested does not change the illegality (United States Department of Justice, 2017).

Despite the elaborative definition of child pornography given by the federal government, individuals still find areas of subjectivity. Subjectivity creates dilemmas for law enforcement and/or prosecutors (Wells, Finkelhor, Wolak, & Mitchell, 2007). Wells et al. (2007) performed a mixed methods study by surveying and calling police departments to obtain both quantitative and qualitative data. The researchers aimed to address the challenges police officers faced when determining whether to arrest someone on a child pornography charge. When performing interviews, researchers noted two key themes that seemed to emerge regarding arrest (Wells et al., 2007).

The first key theme was the inability to positively identify the individual(s) in the child pornographic images or videos as minors (Wells et al., 2007). For example, one police officer taking part in the study noted a call they received from an ex-wife detailing her suspicions that her ex-husband had child pornography housed on a computer. When law enforcement followed the lead, they were able to find one child pornographic video. However, when the investigators on the case brought the video to the prosecution, they refused to take the case to court. The prosecutors conceded that the individual in the video was a minor, but refused the case due to the fact she/he appeared pubescent (Wells et al., 2007).

According to Lanning and Burgess (1989), pubescent children also receive less convictions in court compared to prepubescent children. Guilty verdicts in child pornography are

more likely in cases involving prepubescent children (Seto & Eke, 2015). This example shows prosecutors are hesitant to pursue cases where the individuals are borderline pubescent or past prepubescence (Seto & Eke, 2015). This illustrates why law enforcement officials may be reluctant to bring cases of this nature to prosecutors in the future.

Another example presented in the study involved a computer technician (Wells et al., 2007). A computer technician was repairing a disabled, 25-year old's work laptop when they spotted alarming images of what they thought were children. Law enforcement officials also recognized the imagery as child pornography, noting that the individual(s) lacked pubic hair. However, prosecution was unwilling to advance the case because of the need to confirm the individuals age in the image. They felt that the age of the individual was ambiguous (Wells et al., 2007). This example demonstrates that if prosecution is unable to determine the age of an individual, charges may never occur despite pubescent individuals, up to the age of 18, being included in the federal definition of child pornography (18 USC§ 2256A).

The second key theme was the inability to determine if the nature of the child pornographic images or videos were explicit enough to meet the federal definition (Wells et al., 2007). For example, a police officer participating in the study cited an investigation where a Rent-A-Center reached out to their police department. The Rent-A-Center confiscated a computer from a 40-year old's home and during the confiscation they were advised by the subject not to look at the hard drive. Despite the warning, the Rent-A-Center looked at the suspect's hard drive and found images of nude children. The case investigators estimated that there were 100 nude images on the computer's hard drive (Wells et al., 2007). These images were already known to the investigators as a popular Russian series taken at a nude beach and within a forest. Following the investigation, no arrest was made. Investigators determined that

the images in the series could not be classified under the definition of child pornography due to the fact there was no sexual activity displayed nor was there particular attention paid to the childrens' genitalia in the photographs (Wells et al., 2007). This determination is not uncommon within the law enforcement community.

In a recidivism study utilizing the Child Pornography Offender Risk Tool (CPORT), researchers followed 286 convicted child pornographers for approximately 5 years (Seto and Eke, 2015). During the 5-year follow-up law enforcement officials found that one subject's computer housed nude children; however, they did not fit within the legal standard of child pornography, so the offender was not charged. This same study also found that 86 percent of the study group of child pornographers possessed child nudity images. Further, a third of that sample had a larger collection of child nudity imagery than child pornography (Seto & Eke, 2015). These examples illustrate the challenges facing law enforcement officials when deciding to make an arrest.

However, before an arrest is even contemplated, investigative work needs to occur. The study by Wells et al. (2007) noted that investigation of child pornography cases can prove difficult. Often, investigations can involve multiple jurisdictions (Wells et al., 2007). When multiple jurisdictions need to communicate and transfer cases, valuable time may be lost.

Capturing Child Pornographers

One of the methods law enforcement officials employ to capture child pornographers is operations on peer-to-peer sharing websites (Brewster, 2019). Agents either create their own accounts on these sharing sites or utilize usernames and passwords from other accused child pornographers that consent to release them (Brewster, 2019). Law enforcement then pose as individuals seeking child pornography to catch distributors and producers (Brewster, 2019).

Another method law enforcement officials employ to capture child pornographers using P2P networks, is utilizing systems like RoundUp or Ephex (Wolak et al., 2014). These systems aim to identify the individuals sharing child pornography through Internet Protocol Addresses (IP) (Wolak et al., 2014; Liberatore, Erdely, Kerle, Levine, & Shields, 2010; U.S. Department of Justice, 2010). Once law enforcement officials identify an IP Address associated with child pornography, they seek out the internet provider that supports the IP address (Wolak et al., 2014; Nakashima, 2016). The agency will then present the service provider a subpoena (Wolak et al., 2014). As a result of the subpoena, the internet service provider will supply the agency with information regarding the owner of that IP Address, such as the address and name associated with the account (Wolak et al., 2014). Following the returned subpoena, investigation into the identified account holder will commence (Wolak et al., 2014). Agencies make it a priority to find out if there are other residents within the home that have access to the internet and the layout of the grounds (Wolak et al., 2014; Nakashima, 2016).

Upon completion of an initial background investigation, law enforcement officials will request a search warrant from a judge (Wolak et al., 2014). The search warrant will identify what law enforcement officials are able to collect, whether that be a specific computer or any items they believe to be related to the offense (Wolak et al., 2014). If enough evidence is collected in the initial investigation and/or law enforcement officials believe the suspect has direct access to minors they may also request an arrest warrant (Steel, 2015). If the search warrant is approved, law enforcement officials will execute the warrant and attempt to interview those in the residence (Wolak et al., 2014). After the subject's computer is analyzed and the interviews are completed, the prosecutor will determine whether the case is sufficient to take to court (Wolak et al., 2014).

If the case does not produce sufficient evidence to warrant a trial, the child is likely still affected by the victimization that occurred based upon the findings of Wolak et al. (2005).

Effects of Child Pornography

Effects on Victims

The National Juvenile Online Victimization Study (N-JOV) employed mixed methods through 2,574 mailed surveys and 429 detailed phone interviews with law enforcement officials on the topic of child pornography offenders (Wolak et al., 2005). Researchers were only interested in child pornography cases that resulted in an arrest and were very thorough in detailing eligible case characteristics. The N-JOV study found that 83 percent of the individuals arrested for child pornography were in possession of imagery that involved prepubescent children (Wolak et al., 2005). This finding aligns with a study conducted by Gewirtz-Meydan and colleagues (2018) that administered an online survey consisting of open-ended questions to 133 adults who had been victims of child pornography.

Most victims of child pornography also experience sexual contact with their abuser, whether it be when the photographs were taken or at a different time (Wolak et al., 2005; Gewirtz-Meydan et al., 2018). The N-JOV study found that 71 percent of offenders arrested for child pornography had photographs housed on their devices that portrayed sexual contact between a minor victim and an adult abuser (Wolak et al., 2005). The N-JOV study was unable to account for victims who experienced sexual contact outside of the pornographic images. Gewirtz-Meydan and colleagues (2018) were able to capture the population of child pornography victims who were also victims of contact sexual abuse within their sample of adults who had been victims of child pornography as minors. Of the 133 respondents, 93 percent of the sample also experienced sexual contact (Gewirtz-Meydan et al., 2018).

Many of the child pornographic images that displayed sexual contact on the devices of those arrested in the N-JOV study depicted very graphic content (Wolak et al., 2005). The N-JOV study found that 80 percent of those arrested possessed imagery that contained sexual penetration between an adult and a minor (Wolak et al., 2005). Additionally, 21 percent of those arrested possessed imagery on their devices that revealed violent sexual encounters with minors, including torture and bondage (Wolak et al., 2005).

The Internet Watch Foundation, stationed in the United Kingdom, seeks to eliminate child pornographic images and videos that are available on the internet (Internet Watch Foundation, 2019). The foundation has created a 'Hash List' that contains the digital footprints of known child pornographic images. In 2016, the foundation was able to add 122,972 child pornographic images to the 'Hash List'. Of those 122,972 images, 60,821 of the images depicted graphic content such as the torture and/or rape of minors (Internet Watch Foundation, 2016).

For many children, abuse ensues over long periods of time (Gewirtz-Meydan et al., 2018). The self-report victimization study done by Gewirtz-Meydan and colleagues (2018) found that 80 percent of surveyed survivors endured the abuse for half a year or longer. How long the abuse continues is likely dependent on the access the perpetrator has to the victim. Gewirtz-Meydan and colleagues (2018) reported that 52 percent of the study participants that experienced victimization as minors were abused by a family member. They also noted that female participants reported victimization by family members more often than male participants. Male participants reported victimization by acquaintances more often than female participants (Gewirtz-Meydan et al., 2018).

Being a victim of child pornography leaves behind a range of different emotions and beliefs. Victims of child pornography self-reported feelings of guilt, shame, humility, anxiety,

and fearfulness (Gewirtz-Meydan et al., 2018). This same group of survivors reported that very few of their cases were disclosed to law enforcement or other agencies. There are a multitude of reasons that victims may have chosen not to disclose their abuse. One reason could be that 74 percent of them expressed feeling guilt and shame daily. Another reason could be that few survivors who did disclose their victimization, witnessed justice served through conviction (Gewirtz-Meydan et al., 2018).

Concerns that law enforcement would view them as an active, voluntary participant were also reported.. Fifty-four percent of the self-report participants indicated they were concerned that individuals seeing the child pornography would believe them to be an active participant (Gewirtz-Meydan et al., 2018). Victims may have presumed this reaction because at the time the child pornography was being produced they were naive as to what was occurring. Victims indicated they were told that the photos would serve their futures. Due to this belief, they would often aspire to perform well (Gewirtz-Meydan et al., 2018).

The performance they attempted to play as minors now cause many victims to dwell on their actions (Gewirtz-Meydan et al., 2018). Fifty-one percent of the victims in the study reported feeling guilty for the child pornographic images they are displayed in and 48 percent of victims worry about who will recognize them in the images (Gewirtz-Meydan et al., 2018). Fear of recognition was also noted by Leonard (2010) in a study of therapeutic issues faced by those who were victims of child pornography. A study consisting of interviews and questionnaires with clinicians who worked with victims of child pornography found that continual and unpredictable resurfacing of child pornographic images hindered the healing process (Von Weiler, Haardt-Becker, & Schulte, 2010).

This inability to control who accesses and distributes images victims are portrayed in can cause repeated revictimization (Canadian Centre for Child Protection, 2017). Resultantly, many victims of child pornography will likely need therapy. Martin (2016) called attention to the need for training as many clinicians do not feel knowledgeable in how to administer care for those who have experienced victimization through child pornography.

Effects on Offenders

Victims are not the only ones negatively affected by child pornography. A study completed by Neutze and colleagues (2011), found that 69 percent of 155 participating child pornographers were experiencing significant distress and 16 percent were experiencing slight distress due to their sexual fantasies. The participants were all deemed pedophiles after meeting DSM-IV-TR criteria (Neutze, Seto, Schaefer, Mundt, & Beier, 2011). However, it should be noted that participation in the study was voluntary (Neutze et al., 2011). Child pornographers who are distressed may have been more apt to participate and eager to desist.

Child pornographers also exhibit a lack of sexual self-regulation compared to child contact offenders (Elliott, Beech, Mandeville-Norden, & Hayes, 2009; Seto, Cantor, & Blanchard 2006; Webb, Craissati, & Keen, 2007). Self-regulation is referred to as the “ability to over-ride one’s desires, thoughts, and habitual patterns of behavior” (Gailliot & Baumeister, 2007, p.173). In regard to sexual self-regulation, the definition transitions to expressing those desires and thoughts in an appropriate way deemed by society (Gailliot & Baumeister, 2007). Contrarily, in the study above by Neutze and colleagues (2011) no sexual self-regulation problems were found between child pornographers and those who committed hands-on sexual offenses in the past six months versus those who did not commit either offense in that same time

period. These findings should be considered with caution due to the time of desistance being six months and the lack of comparison between child pornographers and contact sexual abusers.

Arguably the most harmful impact for offenders and victims alike is the normalization of sexual activity between minors and adults (Bourke & Hernandez, 2009). Sexual activity between minors and adults desensitizes child sexual abuse (Bourke & Hernandez, 2009). Further, this activity dehumanizes minors (Bourke & Hernandez, 2009). Dehumanization of minors is intensified when offenders' beliefs are validated and legitimized by others utilizing peer-to-peer sharing sites with individuals who share interest in child pornography (Bourke & Hernandez, 2009). For example, a study examined how sexually explicit material stimulated rapists and child sex offenders (Marshall, 1988). This study found that 33 percent of rapists and 53 percent of child sex offenders observed child pornographic works while preparing themselves for the offense they desired to commit (Marshall, 1988).

Who Accesses Child Pornography?

Understanding the population that view child pornographic websites can help identify characteristics of this population. Identifying characteristics of this population can then be used to prevent and respond to child sexual abuse in the future. The following section will address the demographic, psychological, and offending characteristics of those who access, share, and produce child pornography.

Demographic Characteristics

Age

A typology study conducted in the Netherlands utilized the Minnesota Multiphasic Personality Inventory to profile 22 male child pornographers and 112 other sexual and non-sexual offenders in an outpatient treatment program (Reijnen, Bulten, & Nijman, 2009).

Researchers found that child pornographers tended to be much younger than other sexual delinquent offenders, but relatively similar in age to delinquents with no sexual deviant history (Reijnen et al., 2009). On average, the 22 child pornographers were 37 years of age, while other sexual offenders were 47 years of age (Reijnen et al., 2009).

Those results were echoed in a study performed two years prior by Webb and Colleagues (2007). When comparing 90 child pornographers to 120 child molesters in the Greater London Area, Webb and Colleagues (2007) found that child pornographers were younger than the comparison group of child molesters. Child pornographers were on average 38, while child molesters were on average 45 years of age (Webb et al., 2007). However, McCarthy (2010) and Howitt and Sheldon (2007) found no statistical significance between the ages of child pornographers and contact sexual offenders.

McCarthy (2010) performed a study at the New York Center for Neuropsychology and Forensic Behavioral Science. The study sample consisted of 51 contact sexual offenders who all had possessed, distributed, and/or produced child pornography and 56 non-contact sexual offenders who had passed a polygraph professing their lack of involvement with child pornography. Findings suggest there was no statistical significance in age between contact and non-contact sexual offenders. Contact sexual offenders were on average 38 years old, whereas non-contact sexual offenders were on average 41 years old (McCarthy, 2010).

Howitt and Sheldon (2007) had a voluntary sample of 51 male offenders from a private prison and a probation service within the United Kingdom. The researchers classified the offenders into three separate categories: contact sexual offenders, internet sexual offenders, and mixed sexual offenders that committed both internet and contact offenses (Howitt and Sheldon,

2007). The findings regarding age were statistically insignificant, with all three groups having an average age of 46 to 47 years old (Howitt and Sheldon, 2007).

Bourke and Hernandez (2009) conducted a comparative analysis of child pornographers with contact offenses and child pornographers without contact offenses. The 155 male participants came from a voluntary sex offender treatment program in a federal prison. Despite performing a comparative analysis, they did not split contact sexual offenders from non-contact sexual offenders categorically by age. However, they did state that the median age of all 155 child pornographers was 40.7 (Bourke and Hernandez, 2009).

Studies that did not perform a comparative analysis, found similar average ages for child pornographers. One study conducted in the United Kingdom found that 594 males within their National Probation Service convicted of producing child pornography had an average age of 39.3 (Henry, Mandeville-Norden, Hayes, & Egan, 2010). Another study of 155 self-referred male child pornographers that had no prior contact with the criminal justice system were on average 40 years old (Neutze et al., 2011). The N-JOV study discussed earlier by Wolak and colleagues (2005) found that over 85 percent of the child pornographers in their sample were above the age of 25, 45 percent older than age 40 and 41 percent between the ages of 26 and 39.

Gender

According to Title IX, sex is based on one's biological genitalia at the time of birth (Education Amendments Act of 1972, 2018). During the time many of the following empirical studies were published, the terms: gender, sex, and gender identity were not conceptualized as they are today. To simplify the following studies, gender will be used synonymously with the terminology for sex. However, it should be recognized that the term gender is now classified by

some as socially constructed and gender identity is the gender that one classifies themselves as (Human Rights Campaign, 2019).

The academic literature on child pornography is largely focused on male offenders. In a literature review of 17 scholarly works focused on child pornography, Merdian and Colleagues (2009) found that 99.1 percent of all child pornography offenders were males. Likewise, the 33 identified members of Landslide Production Inc., were all male (Frei, Erenay, Dittmann, & Graf, 2005). Law enforcement officials in the N-JOV study reported that less than 1 percent of the individuals arrested for child pornography were females (Wolak et al., 2005).

While there is a lack of academic literature on female child pornographers, Taylor and Quayle (2003) published research that concluded female child pornographers commonly have victimization experiences and mental health issues. Additionally, Carr (2004) found that while male child pornographers frequently cited pleasure as the rationale for distributing the images, the one female child pornographer cited improving her financial state.

Prat and colleagues (2014) published a qualitative study on two female child pornography offenders. Both women reported that their husbands were present and engaged in the offense of which they were charged (Prat, Bertsch, Chudzik, & Réveillère, 2014). One of the women took part in contact sexual abuse with the victims while the other took pictures as her husband took part in the contact sexual abuse. Both women expressed there was no coercion involved; however, they did glorify and admire their husbands. Neither woman recognized that the offense they committed was wrong, despite showing average reasoning skills (Prat et al., 2014). Despite Taylor and Quayle's (2003) findings, neither of the women offenders were victims of sexual abuse in the past (Prat et al., 2014). These studies need replication as the generalizability is poor with very few female samples.

Race

The United States Census Bureau defines the terms ethnicity and race distinctly from one another (United States Census Bureau, 2017). Race is defined by the Census Bureau as “a person’s self-identification with one or more social groups” and is not confined to only one group (United States Census Bureau, 2017, p. 1). Ethnicity is defined into “two categories: Hispanic or Latino and Not Hispanic or Latino” (United States Census Bureau, 2017, p. 1). It is important to note that not every study defines race and ethnicity as two distinct concepts.

Empirical data suggests child pornographers are predominantly Caucasian; however, most studies have been conducted in predominantly Caucasian regions. In the N-JOV study, law enforcement officials collectively reported that 91 percent of the individuals arrested on child pornography charges were White (Wolak et al., 2005). Bourke and Hernandez (2009) reported that 95 percent of 155 voluntary participants from a federal prison were White. The three studies that focused specifically on child pornographers within Merdian and colleagues (2009) review of literature found that White offenders comprised 91.7 percent of the sample. Foley (2002) conducted a study with 22 referred child pornographers connected with the justice system and over 95 percent were Caucasian.

When comparing internet sex offenders to contact sex offenders, the difference between race and/or ethnicity becomes more ambiguous. McCarthy (2010) found no statistical significance in race between the 51 contact sexual offenders and 56 non-contact sexual offenders within a New York sex offender treatment program. Webb and colleagues (2007) found contrasting results. Webb and colleagues (2007) reported that the 120 contact offenders examined were more diverse racially than the predominately White 90 child pornographers.

Marital Status

Findings vary in terms of child pornographers' marital status. Webb et al. (2007) found that out of 90 child pornographers in the voluntary sex offender treatment program, 38 percent were married while 40 percent were single. The N-JOV study found that of the 429 interviews with law enforcement officials that had resulted in arrest for child pornography, 38 percent of the arrestees were married and 41 percent of the arrestees were unmarried and had never been married (Wolak et al., 2005). The remaining 21 percent of the sample were widowed, divorced, or separated from their partner at the time of arrest (Wolak et al., 2005).

Henry and colleagues (2010) found that of 362 child pornographers sampled, 1 percent of them were widows, 19.9 percent of them were divorced or separated from their spouse, 17.3 percent were still married, and 61.9 percent were not in a relationship. In a sample of 22 child pornographers, Foley (2002) reported that 25 percent lived with a significant other, 31.2 percent were married, and 43 percent resided alone. Of 43 men sampled in an involuntary outpatient treatment program for child pornographers in the Netherlands approximately 35.1 percent were found to be single, approximately 53.7 percent were married or in a relationship, and 10.8 percent were divorced (Surjadi, Bullens, Van Horn, & Bogaerts, 2010).

In the city of Lucerne, the 33 men that were found paying for membership to Landslide Inc. were most commonly not married and had never been intimate with a partner (33 percent) (Frei et al., 2005). The next most common result was those who were married (27 percent), those within a common-law marriage (24 percent), and those who had been divorced, their spouse had died, or they had broken off a relationship (12 percent) (Frei et al., 2005). Reijnen and colleagues (2009) found that of 122 offenders, child pornographers were less likely to have a significant

other (59.1 percent) in comparison to contact sex offenders (34 percent) and nonsexual offenders (34.5 percent).

Parental Status

Reijnen and colleagues (2009) discovered that 18.2 percent of child pornographers, 59.6 percent of contact offenders, and 54 percent of nonsexual offenders have children. Law enforcement officials provided Wolak and Colleagues (2005) with a much higher percentage of child pornographers that had their own children. The N-JOV study found that 42 percent of child pornographers had a biological child (Wolak et al., 2005). Additionally, researchers found that 34 percent of the child pornographers lived with a minor at the time they had committed their crime and 46 percent had access to minors either at home or at various activities outside the home (Wolak et al., 2005). Of the 33 men purchasing access to child pornography through Landslide Inc., 60 percent had no children, 6 percent had one child, and 21 percent had two or three children (Frei et al., 2005).

Employment

Empirical studies consistently show that a majority of child pornographers are employed. The N-JOV study found that 73 percent of arrested child pornographers were employed full-time (Wolak et al., 2005). Likewise, over 70 percent of the 43 males in the Netherland's outpatient treatment program self-reported employment, while another 8.1 percent were retired (Surjadi et al., 2010). In comparison to contact offenders, child pornographers were more likely to be employed (Burke, Sowerbutts, Blundell, and Sherry, 2002). Neutze and Colleagues (2011) results mirrored Burke et al. (2002) in their study of 155 self-referred contact and noncontact sexual offenders.

Educational Attainment

Since employment correlates with education it is not surprising that a majority of child pornographers have completed some form of higher education (Surjadi et al., 2010; Wolak et al., 2005). Surjadi and colleagues (2010) found that of the 43 men involuntarily in an outpatient treatment center, 30.3 percent had started and/or completed college, 30.3 percent had completed level two of their secondary schooling, 30.3 percent had completed level one of their secondary schooling, and 9 percent completed only primary education (up to age 12). The N-JOV study had similar results as 4 percent of child pornographers had a graduate degree, 38 percent had started and/or completed college, 38 percent had completed high school, and 5 percent had not completed high school (Wolak et al., 2005). When contact sex offenders and child pornographers were compared, Burke et al. (2002) found child pornographers had higher educational attainment. However, McCarthy (2010) was unable to find a statistical significance in educational attainment between contact sexual offenders and child pornographers.

Psychological Characteristics

Mental Health

Most data related to mental health of child pornographers was in comparison to contact sex offenders. Reijnen et al. (2009) and Foley (2002) found that the Minnesota Multiphasic Personality Inventory (MMPI) scores were not statistically significant between contact sex offenders and child pornographers. However, Bates and Metcalf (2007) found that child pornographers had fewer cognitive distortions compared to contact sex offenders. Despite fewer cognitive distortions, internet sex offenders were more likely to disapprove of attitudes that excused contact sexual abuse of children, yet internet sex offenders showed less victim empathy in comparison to contact sex offenders (Bates and Metcalf, 2007).

The lack of victim empathy could be derived from child pornographers viewing minors as objects for sexual pleasure (Bourke & Hernandez, 2009; Foley 2002; Howitt and Sheldon, 2007). Additionally, if a child pornographer is not creating and only viewing sexually explicit images/videos of minors it may cause them to believe they are not directly hurting anyone. Howitt and Sheldon (2007) found that child pornographers were more likely to objectify victims than child molesters. Child pornographers may be more likely to objectify children due to antisocial tendencies found through many empirical studies, such as lack of remorse (Foley, 2002; Reijnen et al., 2009; Seto and Eke, 2005). However, Neutze and Colleagues (2011) found that emotional deficits were not statistically different between child pornographers and contact sex offender despite other empirical studies that concluded otherwise (Beech, Elliott, Birgden, & Findlater, 2008; Middleton, Elliot, Mandeville-Norden, & Beech, 2006; Webb et al., 2007).

Both Webb and Colleagues (2007) and Hart and Colleagues (1995) found that contact sex offenders exhibited more psychopathic traits compared to child pornographers. Narcissism is a trait of psychopaths, which could explain why child pornographers are more often willing to access mental health care and receive help than contact sex offenders (Paulhus & Williams, 2002; Webb et al., 2007). Webb and Colleagues (2007) found statistical significance between child pornographers within their sample that had contact with mental health services compared to those that had no contact/access to mental health services, 41 and 21 percent respectively. The N-JOV study found a majority (89 percent) of the child pornographers had never been diagnosed with a mental illness; however, the percentage that contacted mental health services was not reported in this study (Wolak et al., 2005).

Henry and Colleagues (2010) identified three categories of child pornographers. The three statistically significant categories were apparently normal, inadequate, and deviant (Henry

et al., 2010). The apparently normal child pornographer scored near average on all tests and was found to be more socially inclined than the other two categories (Henry et al., 2010). The inadequate child pornographer struggled with low self-esteem and had insufficient social engagement, which is consistent with the inability to regulate emotions found by Middleton et al. (2006) and Henry et al. (2010). Both the apparently normal and the inadequate child pornographers were low in pro-offending characteristics (Henry et al., 2010). The deviant child pornographer was determined to have low empathy for victims (Henry et al., 2010).

Minimizing Blame

Child pornographers commonly employed denial and minimization of blame, also known as disowning behaviors. Middleton et al. (2006) and Bates and Metcalf (2007) found that child pornographers exceed at impression management in comparison to contact sexual offenders, potentially due to their educational attainment. For example, some excuses given by child pornographers were being emailed pornography without initiating a request, child pornography appearing on their screen while simply browsing the internet, and/or mental health problems (Bourke and Hernandez, 2009). One example of this disowning behavior was displayed by 15 out of 33 offenders in the Lucerne study who cited that they did not know they committed an offense by being members of the Child Pornography website, Landslide Inc. (Frei et al., 2005). However, it is possible that these offenders were not trying to employ disowning behaviors but were unaware of the laws.

Another example of disowning behavior was shown through Bourke and Hernandez's (2009) study. Bourke and Hernandez (2009) sampled 155 voluntary offenders in a treatment program all charged with a child pornography-related offense. Researchers split the offenders into two groups: formal prior contact sexual offense(s) and no formal prior contact sexual

offense(s) (Bourke and Hernandez, 2009). Of the 155 offenders, 74 percent (n=115) had never been formally accused of committing a hands-on offense, while 26 percent (n=40) had documented histories of sexual contact with minors (Bourke and Hernandez, 2009). Upon completion of the treatment program 85 percent (n=131) of the offenders in the sample acknowledged participation in a contact sexual offense with a minor (Bourke and Hernandez, 2009). There were 75 known victims prior to treatment and 1,777 known victims following treatment for an average victim total of 13.56 per offender (Bourke and Hernandez, 2009). This disowning behavior is not uncommon, and the underreporting of past sexual offenses was found in other empirical studies as well (Abel, Becker, Cunningham-Rathner, Rouleau, & Murphy, 1987; Ahlmeyer, Heil, McKee, & English, 2000; Kaplan, 1985).

Substance Abuse

Webb and Colleagues (2007) found that only 9 percent of the 90 child pornographers within their sample had been abusing alcohol at the time of their offense, and only 3 percent were abusing drugs. While contact sex offenders did appear to abuse alcohol or drugs at a higher rate, the only statistical significance between child pornographers and contact sex offenders in relation to substance abuse was that contact sex offenders abused both alcohol and drugs together at a higher rate (Webb et al., 2007). Consistent with Webb and Colleagues (2007) results, McCarthy (2010) found that contact sex offenders abused alcohol and drugs more frequently than child pornographers. Law enforcement officials participating in the N-JOV study reported that 18 percent of those arrested on child pornography related offenses had recognized drug and/or alcohol abuse related issues (Wolak et al., 2005).

Childhood Sexual Abuse

Webb et al. (2007) found no statistical significance between the 26 percent of child pornographers and 32 percent of contact sex offenders who had experienced childhood sexual abuse. However, there was statistical significance found for physical childhood abuse (Webb et al., 2007). Of 120 contact sexual offenders in the study sample, 25 percent reported experiencing childhood compared to only 12 percent of the 90 child pornographers (Webb et al., 2007). When comparing 56 non-contact sex offenders to 51 contact sex offenders, McCarthy (2010) found no statistical significance. Foley (2002) found a significantly higher rate of childhood sexual abuse for contact sexual offenders; however, it should be recognized that his sample consisted of 22 offenders. Of those 22 offenders, 50 percent of them had been victims of childhood sexual abuse (Foley, 2002).

Offending Characteristics

Prior Criminal History

The majority of child pornographers appear to be law-abiding citizens (Bourke & Hernandez, 2009; Burke et al., 2002; Webb et al., 2007; Wolak et al., 2005). According to the results of the N-JOV study, only 11 percent of their sample had ever been arrested for a sex offense, only 22 percent had been arrested for a nonsexual offense and only 11 percent had ever been known to be violent (Wolak et al., 2005). Those who were arrested for a prior sex offense were more likely to be contact sexual offenders rather than child pornographers (Webb et al., 2007; McCarthy, 2010). However, non-contact offenders in Bourke and Hernandez's (2009) study admitted that if they had means to access minors and favorable circumstances, they likely would have committed a hands-on sexual offense.

Seto, Eke, and Williams (2011), found that of the 541 child pornographers in their sample, 47 percent had criminal histories. Contrary to the N-JOV study, Seto et al. (2011) found that 21 percent of the offenders had known violent offenses on their records and 18 percent had previously committed a hands-on sexual offense. Another study by Seto and Eke (2015), found that only six percent of their sample had prior child pornography charges and 19 percent had previously been convicted for a different sex offense. However, there was a large discrepancy between the percentage of nonsexual offenders in the N-JOV study (22 percent) compared to Seto and Eke's (2015) study (43 percent). It is important to note that the studies above did not detail if offenders had been convicted of both a contact and child pornography offense prior to the current conviction. This is important because both Bourke and Hernandez (2009) and Wolak et al. (2005) found that many child pornographers are dual offenders who also engage in contact sexual offending.

Recidivism

Once an offender was released post-conviction, Seto and Eke (2015) and Webb et al., (2007) found that offenders charged with child pornography were unlikely to commit a contact sexual offense. The offenders that were most likely to recidivate were ones who had been convicted of contact sex offenses against minors previously (Seto and Eke, 2015). Faust, Renaud, and Bickart (2009), researchers with the Federal Bureau of Prisons, performed a study of 870 men who had been convicted of child pornography. They followed these men for approximately four years and only 5.7 percent were arrested for another sex offense (Faust et al., 2009). Below average educational attainment, singleness, possessing hand-held child pornography, previous involvement in treatment for contact offending, and only housing imagery

of prepubescent children were the five statistically significant predictors of recidivating (Faust et al., 2009).

Eke, Seto, and Williams (2011) followed a sample of 541 male child pornographers in Canada for approximately 4 years. Within those 4 years they found that 32.3 percent of the offenders had been rearrested (Eke et al., 2011). Approximately 53 percent had committed a new sex offense, with 11 percent of new sex offenses being child pornography related (Eke et al., 2011). In a separate study by Seto et al. (2015), 286 offenders were followed for approximately five years. Within those five years, three percent of the sample committed new hands-on offenses, while 11 percent committed new child pornography offenses (Seto et al., 2015). In addition, they found that criminal history, age of the offender, a pedophilia diagnosis or admission to pedophilia, hands-on offending, violation of conditional release, and atypical sexual preferences were all predictors of recidivating (Seto et al., 2015). However, unlike Faust et al. (2009), marital status and hand-held pornography were not found to be indicative of re-offending (Seto et al., 2015).

In a report to congress, the United States Sentencing Commission (2012) documented a recidivism study that followed 610 child pornographers for approximately eight and a half years. The Commission (2012) found that approximately 30 percent of the sample recidivated, with 7.4 percent being sexual re-offending. There is evidence that the Risk Matrix, utilized in a study performed by Wakeling, Howard, and Barnett (2011), can identify recidivism among child pornographers. The Risk Matrix was assigned to a total of 1,344 child pornographers and researchers then tracked them for a span of two years (Wakeling et al., 2011). Scores were found to forecast recidivism among child pornographers within the sample (Wakeling et al., 2011).

Conclusion

This review of the literature highlights the importance to create profiles of child pornography offenders. The literature suggests that there are shared characteristics among child pornographers and between child pornographers and contact child sex offenders. Despite the similarities, many studies also presented contrasting characteristics. Further research is needed to guide policy and program initiatives to address child pornography. This study will add to the body of research about child pornography offenders and will be the first study to examine child pornographers in North Dakota. The next chapter will address the methodology utilized in the current study.

CHAPTER III: METHODS

Understanding characteristics of child sexual offenders, specifically child pornographers, will help prevent and respond to child sexual abuse. This research project will identify characteristics of offenders convicted of downloading, distributing, and/or producing child pornography. First, the project will examine the characteristics of child pornographers under federal supervision in North Dakota to see if characteristics are similar to previous empirical research. Next, the project will compare those under federal supervision in North Dakota for child pornography to general offenders to note any differences between the populations. Lastly, this project will perform a comparative analysis between those under federal supervision for child pornography to those under federal supervision for a different sex offense.

Description of Sample

The population of interest includes all offenders under federal supervision between the years 2015-2019. After removing duplicate entries, the final sample consisted of 1,728 offenders. A different sample was drawn for each of the three research questions. The sample for research question number one will consist of offenders with a child pornography related charge. The final sample of offenders with a child pornography related offense was 34. Although this sample size is smaller than one would like, other researchers have utilized small samples in child pornography research (for example, see Reijnen et al., 2009; Howitt and Sheldon, 2007; Frei et al., 2005; Foley, 2002; Surjadi et al., 2010).

Research question number two will divide the population of offenders into two distinct groups: child pornographers and general offenders. General offenders are individuals who have not been charged with any type of sexual offense. The sample of child pornographers consisted of 34 individuals and the sample of general offenders consisted of 1,552 individuals.

Research question number three will also divide the population of offenders into two distinct groups: child pornographers and those charged with any other type of sexual offense. The sample of 34 child pornographers will remain consistent. The final sample of those charged with a different type of sex offense consists of 142 individuals.

Data

The data for this study were requested from the District of North Dakota, Federal Probation and Pretrial Supervision Services. All data are secondary in nature. The data were collected by North Dakota Federal Probation Services as part of their routine operations. There was no face-to-face interaction with any clients under North Dakota Federal Probation Services for the purpose of this study. The provided data were for all individuals who have been under North Dakota Federal Probation Services supervision at any time between 2015-2019. Data were provided to the research team in electronic format after institutional review board approval. The data provided included: demographic information, offense information, and psychological information.

Measures

This study will analyze characteristics for each of the study groups. The study groups are defined as general offenders, child pornographers, and all other sex offenders. For research question number one and research question number two, child pornographers will be operationalized as 0 and general offenders will be operationalized as 1. Only child pornographers operationalized as 0 will be utilized in research question number one. Research question number three will compare child pornographers operationalized as 0 and all other sex offenders operationalized as 2.

The variables of interest will be demographic, psychological and offending characteristics. Specific demographic characteristics to be examined were age, gender, race, marital status, and educational attainment. Psychological characteristics were assessed by examining the presentation of mental health. Offending characteristics were measured through prior criminal history. The data received from North Dakota Federal Probation Services were limited and did not include parental status, employment, childhood sexual abuse, substance abuse, or violations of parole.

Age: Research shows that offenders convicted of a child pornography related offense are typically 37 to 47 years of age (Howitt and Sheldon, 2007; Reijnen et al., 2009). For this study, age will be operationalized as the date they started supervision minus date of birth.

Gender: Merdian et al. (2009), Frei et al. (2005), and Wolak et al. (2005) found that over 90 percent of all child pornographers were males. Gender will be operationalized as male = 0 and female = 1.

Race: Prior research indicates that over 90 percent of child pornographers are Caucasian (Wolak et al., 2005; Bourke and Hernandez, 2009; Merdian et al., 2009; Foley, 2002). Race was operationalized as White = 0, Black or African American = 1, American Indian or Alaska Native = 2, or Asian = 3.

Marital status: Findings have varied in terms of child pornographers' marital status (Frei et al., 2005; Henry et al., 2010; Reijnen et al., 2009; Webb et al., 2007). Marital status will be operationalized as married = 0 or single/other = 1.

Educational attainment: Past research indicates child pornographers as more intellectually inclined than other offenders, as well as having high completion rates of some form of higher education (Burke et al., 2002; Surjadi et al., 2010; Wolak et al., 2005) Educational

attainment will be operationalized as less than high school = 0, high school or equivalent = 1, and some college or more = 2.

Presentation of mental health: Child pornographers demonstrate a lack of victim empathy (Bourke & Hernandez, 2009; Foley 2002; Howitt and Sheldon, 2007). Despite their lack of empathy, child pornographers exhibit less psychopathic traits in comparison to child molesters (Hart et al., 1995; Webb et al., 2007). Presentation of mental health will be operationalized as: no evidence of mental health = 0 or history of/ongoing mental health issues = 1.

Prior criminal history: The majority of child pornographers have no prior criminal history (Bourke & Hernandez, 2009; Burke et al., 2002; Webb et al., 2007; Wolak et al., 2005). For the current study, prior criminal history will be operationalized through roman numerals assigned to offenders based on the guidelines outlined in section 4A of the US Sentencing Guidelines Manual. Offenders criminal history points fall into certain criminal history categories (roman numerals). Using those categories in combination with offense level (which has rules about seriousness of current conviction), a guideline range is created. The guideline range is utilized by courts at time of sentencing. The higher the roman numeral, the more severe the criminal history. This information was gathered from Federal Probation and Pretrial Supervision Services of North Dakota. Table 1 displays the Federal Sentencing Guidelines utilized to designate criminal history roman numerals.

Table 1*Sentencing Table Utilizing Criminal History Roman Numerals*

Offense Level	Criminal History Category					
	I	II	III	IV	V	VI
1	0-6	0-6	0-6	0-6	0-6	0-6
2	0-6	0-6	0-6	0-6	0-6	1-7
3	0-6	0-6	0-6	0-6	2-8	3-9
4	0-6	0-6	0-6	2-8	4-10	6-12
5	0-6	0-6	1-7	4-10	6-12	9-15
6	0-6	1-7	2-8	6-12	9-15	12-18
7	0-6	2-8	4-10	8-14	12-18	15-21
Zone A	0-6	4-10	6-12	10-16	15-21	18-24
9	4-10	6-12	8-14	12-18	18-24	21-27
10	6-12	8-14	10-16	15-21	21-27	24-30
Zone B	8-14	10-16	12-18	18-24	24-30	27-33
12	10-16	12-18	15-21	21-27	27-33	30-37
Zone C	12-18	15-21	18-24	24-30	30-37	33-41
14	15-21	18-24	21-27	27-33	33-41	37-46
15	18-24	21-27	24-30	30-37	37-46	41-51
16	21-27	24-30	27-33	33-41	41-51	46-57
17	24-30	27-33	30-37	37-46	46-57	51-63
18	27-33	30-37	33-41	41-51	51-63	57-71
19	30-37	33-41	37-46	46-57	57-71	63-78
20	33-41	37-46	41-51	51-63	63-78	70-87
21	37-46	41-51	46-57	57-71	70-87	77-96
22	41-51	46-57	51-63	63-78	77-96	84-105
23	46-57	51-63	57-71	70-87	84-105	92-115
24	51-63	57-71	63-78	77-96	92-115	100-125
25	57-71	63-78	70-87	84-105	100-125	110-137
26	63-78	70-87	78-97	92-115	110-137	120-150
Zone D	70-87	78-97	87-108	100-125	120-150	130-162
28	78-97	87-108	97-121	110-137	130-162	140-175
29	87-108	97-121	108-135	120-151	140-175	151-188
30	97-121	108-135	121-151	135-168	151-188	168-210
31	108-135	121-151	135-168	151-188	168-210	188-235
32	121-151	135-168	151-188	168-210	188-235	210-262
33	135-168	151-188	168-210	188-235	210-262	235-293
34	151-188	168-210	188-235	210-262	235-293	262-327
35	168-210	188-235	210-262	235-293	262-327	292-365
36	188-235	210-262	235-293	262-327	292-365	324-405
37	210-262	235-293	262-327	292-365	324-405	360-life
38	235-293	262-327	292-365	324-405	360-life	360-life
39	262-327	292-365	324-405	360-life	360-life	360-life
40	292-365	324-405	360-life	360-life	360-life	360-life
41	324-405	360-life	360-life	360-life	360-life	360-life
42	360-life	360-life	360-life	360-life	360-life	360-life
43	life	life	life	life	life	life

Analysis

Data was analyzed using SPSS. The first analysis examined univariate statistics (e.g., mean, median, mode). The second two research questions require the use of bivariate statistics; t-tests and chi square tests. The following chapter will address the results of the data analyses.

CHAPTER IV: RESULTS

The purpose of this study was to examine the characteristics of child pornographers on federal supervision in the state of North Dakota and to compare and contrast to other sex offenders and general offenders. This chapter will provide an overview of the descriptive statistics for each of the offending groups and display the findings of the analyses for research questions one, two, and three.

Results for Research Question One

Research question number one addresses the following: “What are the demographic, psychological, and offending characteristics of those under federal supervision for child pornography in the state of North Dakota?” The sample size for research question number one was 34 child pornographers. Although this is a relatively small number, other studies focusing on child pornography have utilized similar sample sizes (for example, see Reijnen et al., 2009; Howitt and Sheldon, 2007; Frei et al., 2005; Foley, 2002; Surjadi et al., 2010).

Age

The first stage of analysis utilized descriptive statistics to identify demographic, psychological, and offending characteristics for child pornographers under federal supervision in the state of North Dakota. Table 2 presents the descriptive statistics for age. Child pornographers had an average age of 42.94 with a standard deviation of 11.3. Sample age ranged between 26 to 68 years old. Of the 34 individuals in the sample, 1 was missing data on age.

Table 2*Child Pornographers Age Demographic Information*

Age	n	%
25-29	2	6.06
30-34	9	27.27
35-39	5	15.15
40-44	3	9.09
45-49	4	12.12
50+	10	30.4

Mean = 42.94

SD = 11.3

min – max = [26, 68]

Gender

Table 3 presents child pornographers descriptive statistics for gender. The sample is almost entirely male. Males made up 96.7 percent of the sample and females made up 3.3 percent of the sample. There were 4 individuals missing gender data.

Table 3*Child Pornographers Gender Demographic Information*

Gender	n	%
Male	29	96.7
Female	1	3.3

Race

Table 4 presents child pornographer data for race. Descriptive statistics show that 100 percent of child pornographers within the sample were white. Out of the 34 individuals within the sample, 4 were missing data on race.

Table 4*Child Pornographers Race Demographic Information*

Race	n	%
White	30	100
Black or African American	0	0
American Indian or Alaska Native	0	0
Asian	0	0

Marital Status

Table 5 details child pornographers marital status data. Marital status was dichotomized as married or other due to the small sample size. Results show that 16.1 percent of child pornographers were married, while 83.9 percent were single or have some other relationship status. Three individuals within the sample were missing marital status data.

Table 5*Child Pornographers Marital Status Information*

Marital Status	n	%
Married	5	16.1
Single/Other	26	83.9

Educational Attainment

Table 6 presents educational attainment data. Educational attainment was broken down into three categories: less than high school educational attainment, high school or equivalent educational attainment, and some college or more. The findings suggest the majority of child pornographers have completed some college or more. Only 19.4 percent of the sample had less than high school educational attainment.

Table 6*Child Pornographers Educational Attainment Information*

Educational Attainment	n	%
Less than HS	6	19.4
HS or Equivalent	11	35.5
Some College or More	14	45.2

Presentation of Mental Health

Table 7 details the presentation of mental health in child pornographers. Presentation of mental health was dichotomized as: no evidence of mental health or history of/ongoing mental health issues. Through descriptive statistics, 2.9 percent of child pornographers were found to have no evidence of mental health, 26.5 percent were found to have history of/ongoing mental health issues, and 70.6 percent were missing mental health data. Due to the majority of the sample missing mental health data, findings on mental health are not generalizable.

Table 7*Child Pornographers Mental Health Information*

Presentation of Mental Health	n	%
No Evidence of Mental Health	1	2.9
History of Mental Health	9	26.5
Missing	24	70.6

Prior Criminal History

As noted above, prior criminal history will be operationalized through roman numerals assigned to offenders based on the guidelines outlined in section 4A of the US Sentencing Guidelines Manual (See Table 1). The higher the roman numeral, the more severe the criminal history. Table 8 displays child pornographers criminal history numerals. The majority of child pornographers (83.3%) have a criminal history numeral of I. Given these numerals are based upon prior offending and severity of offense, most child pornographers appear to be law abiding

prior to the current conviction. However, it should be noted that 10 individuals within the sample were missing criminal history numerals.

Table 8

Child Pornographers Criminal History Information

Criminal History	n	%
I	20	83.3
II	2	8.3
III	2	8.3
IV	0	0
V	0	0
VI	0	0

Summary for Research Question One

Research question one asked “What are the demographic, psychological, and offending characteristics of those under federal supervision for child pornography in the state of North Dakota?” The results suggest that the typical child pornographer for the current sample is a White male between the ages of 42 and 43, has a relationship status of single or other, has completed some college or more, and has limited to no prior criminal history.

Results for Research Question Two

Research question number two addresses the following: “What are the differences in characteristics between general offenders and child pornographers?” The second stage of analysis utilizes the descriptive statistics found in research question number one, in addition to bivariate statistics (chi-square and t-tests) to compare multiple characteristics between general offenders and child pornographers.

Age

The comparison of age between general offenders and child pornographers was analyzed through an independent sample t-test with a 95 percent confidence interval (CI) for the mean

difference. An independent sample t-test was utilized because it gives the ability to determine statistical significance between the means of an independent categorical variable with two groups and a continuous dependent variable. The findings are displayed in Table 9 and the results indicate that the mean age of general offenders is 36.60 with a standard deviation of 10.968 and the mean age of child pornographers is 42.94 with a standard deviation of 11.347. Since the p-value of 0.001 is less than our chosen significance level $\alpha = 0.05$, the null hypothesis is rejected, concluding there is a significant difference in age between general offenders and child pornographers. Child pornographers are significantly older than general offenders.

Table 9

Comparison of Ages between General Offenders and Child Pornographers

Age	n	mean	SD
General Offenders	1523	36.60	10.968
Child Pornographers	33	42.94	11.347

t=-3.284

df=1554

P-value=0.001

Gender

Gender was compared between general offenders and child pornographers through a chi-square analysis using a 95 percent CI. The chi-square analysis was utilized to determine whether there was a significant association between variables. The analysis found that general offenders have a much higher percentage of female offenders (24.1%) compared to child pornographers (3.3%). This finding was significant ($\chi^2 = 6.998$; $p < .05$) (Table 10).

Table 10*Comparison of Gender between General Offenders and Child Pornographers*

Gender	General Offenders		Child Pornographers	
	n	%	n	%
Male	1044	75.9	29	96.7
Females	331	24.1	1	3.3

X² = 6.998

df=1

P-value=0.008

Race

The race of general offenders and child pornographers was also tested using a chi-square analysis and a 95 percent CI. The sample of child pornographers was 100 percent White, while the sample of general offenders was more racially diverse with an even distribution between White and American Indian or Alaskan Native individuals. Table 11 displays a Pearson chi-square value of 6.998 and a p-value of 0.000. The p-value once again indicates that there is significance at $p < .05$. It should be noted that 3 cells have expected counts of less than five, which indicates that results should be interpreted with caution; however, this caution is a result of there being no variation in racial categories for Child Pornographers.

Table 11*Comparison of Race between General Offenders and Child Pornographers*

Race	General Offenders		Child Pornographers	
	n	%	n	%
White	697	51.5	30	100
Black or African American	94	6.9	0	0
American Indian or Alaska Native	552	40.8	0	0
Asian	10	0.8	0	0

X²=6.998

df=1

P-value=0.000

Marital Status

Marital status was analyzed using a chi-square test and a 95 percent CI. The findings of marital status were relatively synonymous between general offenders and child pornographers. Table 12 displays a Pearson chi-square value of .002 and a p-value of 0.968. Since the p-value of .968 is greater than our chosen significance level $\alpha = 0.05$, we fail to reject the null hypothesis, concluding no significant difference in marital status between general offenders and child pornographers.

Table 12

Comparison of Marital Status between General Offenders and Child Pornographers

Marital Status	Other Sex Offenders		Child Pornographers	
	n	%	n	%
Married	211	15.9	5	16.1
Single/Other	1119	84.1	26	83.9

$X^2 = 0.002$

df=1

P-value=0.968

Educational Attainment

Table 13 presents the comparison of educational attainment between general offenders and child pornographers. As displayed by the table, a higher percentage of child pornographers completed some college or more. A chi-square analysis with a 95 percent CI was performed to investigate significance. The analysis found a Pearson chi-square value of 2.172 and a p-value of 0.338. The p-value indicates there is no significance at $p < .05$. Therefore, there is no statistically significant difference between the educational attainment of general offenders versus the educational attainment of child pornographers.

Table 13*Comparison of Educational Attainment between General Offenders and Child Pornographers*

Educational Attainment	General Offenders		Child Pornographers	
	n	%	n	%
Less than HS	348	27.3	6	19.4
HS or Equivalent	505	39.6	11	35.5
Some College or More	421	33	14	45.2

 $X^2 = 2.172$

df=2

P-value=0.338

Presentation of Mental Health

Mental health was analyzed using a chi-square analysis at the 95 percent CI. Table 14 displays a Pearson chi-square value of 47.302 and a p-value of 0.000. Since the p-value of 0.000 is less than the significance level $\alpha = 0.05$, the null hypothesis is rejected. Given the null hypothesis is rejected, the analysis suggests there is a statistically significant difference between general offenders and child pornographers in terms of mental health. Table 14 suggests that general offenders present mental health more frequently than child pornographers. However, mental health results for the current study should be interpreted with caution as 70.6 percent of child pornographers and 21.7 percent of general offenders have missing mental health data.

Table 14*Comparison of Mental Health between General Offenders and Child Pornographers*

Mental Health	General Offenders		Child Pornographers	
	n	%	n	%
No Evidence of Mental Health	570	36.7	1	2.9
History of Mental Health Condition	645	41.6	9	26.5
Missing	337	21.7	24	70.6

 $X^2 = 47.302$

df=2

P-value=0.000

Prior Criminal History

Table 15 presents a comparison of criminal history between general offenders and child pornographers. As displayed by the table, the majority of child pornographers within the sample have a criminal history numeral of I. General offenders displayed more heterogeneity in criminal history numerals. A chi-square analysis at the 95 percent CI was performed to identify significance. The analysis found a Pearson chi-square value of 17.585 and a p-value of 0.004. The p-value indicates there is significance at $p < .05$. Therefore, general offenders have lengthier criminal histories in comparison to child pornographers. It should be noted that 5 cells have expected counts of less than 5, however low cell counts were to be expected with the amount of criminal history numerals versus the amount of individuals within the child pornography sample.

Table 15

Comparison of Criminal History between General Offenders and Child Pornographers

Criminal History	General Offenders		Child Pornographers	
	n	%	n	%
I	460	41.6	20	83.3
II	174	15.7	2	8.3
III	206	18.6	2	8.3
IV	78	7.1	0	0
V	72	6.5	0	0
VI	116	10.5	0	0

$X^2 = 17.585$

df=5

P-value=0.004

Summary for Research Question Two

Research question two asked “What are the differences in characteristics between general offenders and child pornographers?” The results suggest that child pornographers and general offenders differ statistically in age, gender, race, mental health status, and criminal history. There was no statistically significant difference found between child pornographers and general

offenders for marital status or educational attainment. These findings will be addressed in more detail in the discussion section.

Results for Research Question Three

Research question number three addresses the following: “What are the differences in characteristics between those under federal supervision for child pornography versus a different sex crime?” The third stage of analysis utilizes the descriptive statistics found in research question number one and bivariate statistics to compare multiple characteristics of child pornographers and other sexual offenders.

Age

Table 16 presents the study findings comparing ages of child pornographers and other child sexual offenders. Age was compared using an independent sample t-test with a 95 percent CI. The findings displayed in Table 16 indicate the mean age of child pornographers is 42.94 with a standard deviation of 11.347, while the mean age of other sexual offenders is younger at 38.31 with a standard deviation of 13.248. Since the p-value of 0.066 is greater than the significance level of $\alpha = 0.05$, the null hypothesis is not rejected suggesting there is no significant difference in age of child pornographers and those charged with other sexual offenses.

Table 16

Comparison of Ages between Child Pornographers and Other Sex Offenders

Age	n	mean	SD
Other Sex Offenders	140	38.31	13.248
Child Pornographers	33	42.94	11.347

t=1.851

df=171

P-value=0.066

Gender

Gender of child pornographers and other child sexual offenders was analyzed using a chi-square test with a 95 percent CI. Table 17 displays a Pearson chi-square value of 0.138 and a p-value of 0.711. The p-value indicates that there is no significance at the $p < .05$. The findings of the analysis show the vast majority of child pornographers and other sex offenders are male.

Table 17

Comparison of Gender between Child Pornographers and Other Sex Offenders

Gender	Other Sex Offenders		Child Pornographers	
	n	%	n	%
Male	134	97.8	29	96.7
Female	3	2.2	1	3.3

$X^2 = 0.138$

df=1

P-value=0.711

Race

Table 18 presents the comparison of race between child pornographers and other child sexual offenders. Race was compared between child pornographers and other sexual offenders using a chi-square test with a 95 percent CI. As displayed through the table, 100 percent of child pornographers were White, while race of sexual offenders was more diverse. A majority of other sexual offenders were American Indian or Alaska Native. The table displays a Pearson chi-square value of 41.485 and a p-value of .000. The p-value indicates that there is significance at $p < .05$. Results should be interpreted with caution given 3 cells have expected counts of less than 5. However, caution is largely a result of there being no variation in racial categories for Child Pornographers (see Table 23).

Table 18*Comparison of Race between Child Pornographers and Other Sex Offenders*

Race	Other Sex Offenders		Child Pornographers	
	n	%	n	%
White	47	35.1	30	100
Black or African American	6	4.5	0	0
American Indian or Alaska Native	79	59	0	0
Asian	2	1.5	0	0

 $X^2 = 41.485$

df=3

P-value=0.000

Marital Status

The comparison of marital status between child pornographers and other sexual offenders was analyzed using a chi-square test with a 95 percent CI. Table 19 displays a Pearson chi-square value of .063 and a p-value of .801. Since the p-value of .801 is greater than the chosen significance level $\alpha = 0.05$, the null hypothesis fails to be rejected, concluding there is no significant difference in marital status between child pornographers and other sexual offenders.

Table 19*Comparison of Marital Status between Child Pornographers and Other Sex Offenders*

Marital Status	Other Sex Offenders		Child Pornographers	
	n	%	n	%
Married	24	18	5	16.1
Single/Other	109	82	26	83.9

 $X^2 = 0.063$

df=1

P-value=0.801

Educational Attainment

Table 20 presents a comparison of educational attainment between child pornographers and other sexual offenders. A higher percentage of child pornographers have completed high school or equivalent and some college or more in compared to other sexual offenders. The chi-square analysis at the 95 percent CI was performed to identify significance. The analysis found a

Pearson chi-square value of 2.188 and a p-value of 0.335. The p-value indicates that there is no significance at the $p < .05$. Concluding there is no significant difference between the educational attainment of child pornographers and other sexual offenders.

Table 20

Comparison of Educational Attainment between Child Pornographers and Other Sex Offenders

Educational Attainment	Other Sex Offenders		Child Pornographers	
	n	%	n	%
Less than HS	42	31.8	6	19.4
HS or Equivalent	45	34.1	11	35.5
Some College or More	45	34.1	14	45.2

$X^2 = 2.188$

df=2

P-value=0.335

Presentation of Mental Health

The comparison of mental health status of child pornographers and other sex offenders was analyzed with a chi-square test at the 95 percent CI. As highlighted in research question number two, a third category was created to account for missing data on mental health. Child pornographers were missing mental health data on 24 cases and other sex offenders were missing data on 42 cases. Table 21 displays a Pearson chi-square value of 21.541 and a p-value of .000. The p-value indicates that there is significant at the $p < .05$. However, these findings are not generalizable due to the amount of missing data.

Table 21

Comparison of Mental Health between Child Pornographers and Other Sex Offenders

Mental Health	Other Sex Offenders		Child Pornographers	
	n	%	n	%
No Evidence of Mental Health	40	28.2	1	2.9
History of Mental Health Condition	60	42.3	9	26.5
Missing	42	29.6	24	70.6

$X^2 = 21.541$

df=2

P-value=0.000

Prior Criminal History

Table 22 presents a comparison of criminal history between child pornographers and other sexual offenders. A chi-square analysis at the 95 percent CI was performed to identify significance. The analysis found a Pearson chi-square value of 6.042 and a p-value of 0.302. The p-value indicates there is no significance at $p < .05$. As displayed by the table and indicated by statistical significance, a majority of child pornographers and other sexual offenders have low criminal history numerals. It should be noted that 7 cells have expected counts of less than 5, which indicates that results should be interpreted with caution. However, the seven expected cell counts of less than 5 are mainly a result of the amount of individuals within the child pornography sample versus of the number of criminal history numerals.

Table 22

Comparison of Criminal History between Child Pornographers and Other Sex Offenders

Criminal History	Other Sex Offenders		Child Pornographers	
	n	%	n	%
I	69	58.5	20	83.3
II	17	14.4	2	8.3
III	18	15.3	2	8.3
IV	8	6.8	0	0
V	2	1.7	0	0
VI	4	3.4	0	0

$X^2 = 6.042$

df=5

P-value=0.302

Summary for Research Question Three

Research question three asked “What are the differences in characteristics between those under federal supervision for child pornography versus a different sex crime?” The results suggest that child pornographers and other sexual offenders have more similarities compared to general offenders and child pornographers. Child pornographers and other sexual offenders race and mental health status are statistically different. There was no statistically significant

difference found between child pornographers and other sexual offenders in age, gender, marital status, educational attainment, and criminal history. These findings will be addressed in more detail in the discussion section.

CHAPTER V: CONCLUSION

The concluding chapter will provide an overview of the current study and how the results compare to existing academic literature on child pornography. In addition, study limitations will be highlighted.

Discussion

Global studies have demonstrated some consistency in demographic, psychological, and offending characteristics of child pornographers (Bourke and Hernandez, 2009; Henry et al., 2010; Merdian et al., 2009; Neutze et al., 2011; Reijnen et al., 2009; Wolak et al., 2005). However, there is limited research on child pornographer characteristics within the United States and no prior research in the state of North Dakota. The current study aims to add to the body of literature by analyzing characteristics of child pornographers under federal supervision in North Dakota. In addition, the current study sought to address the characteristics of child pornographers in comparison to other sexual offenders and general offenders in North Dakota.

In order to perform this study, data was provided by Federal Probation and Pretrial Supervision Services in North Dakota. The final sample of child pornographers was 34 individuals. The final sample of other sexual offenders was 142 individuals and the final sample of general offenders was 1,552 individuals. The study used descriptive statistics and bivariate statistics (t-tests and Chi-Square) to analyze the data.

Research Question One

Research question one investigated the characteristics of child pornographers under federal supervision in the state of North Dakota. Table 23 details findings and compares past research and the current research findings

The findings for research question number one suggest that child pornographers are on average age 42-43 years old. This finding is similar to previous research that indicated convicted child pornographers were 37 to 47 years old (Howitt and Sheldon, 2007; Reijnen et al., 2009). A study of 594 males convicted of producing child pornography in the United Kingdom had an average age of 39.3 (Henry et al., 2010). Similar results were reported by Neutze et al. (2011) who found child pornographers were 40 years old. Wolak and colleagues (2005) found 45 percent of their sample was older than age 40 and 41 percent of the sample was between the ages of 26 to 39.

Research question number one also found the majority of child pornographers were males. The academic literature on child pornography is limited to male offenders. Future research should attempt to acquire a larger sample of females. However, in the limited academic literature that is inclusive of females, majority of child pornographers are still males. Merdian and Colleagues (2009) found through their literature review that 99.1 percent of all child pornography offenders were males. Law enforcement officials in the N-JOV study reported that less than one percent of individuals arrested for child pornography were females (Wolak et al., 2005). Similarly, the 33 identified members of Landslide Production Inc., were all male (Frei et al., 2005).

Table 23

Comparison of Findings Between Current Study and Past Literature

	Current Study	Howitt & Sheldon (2007)	Reijnen et al. (2009)	Henry et al. (2010)	McCarthy et al. (2010)	Neutze et al. (2011)	Wolak et al. (2005)	Merdian et al. (2009)	Frei et al. (2005)	Bourke & Hernandez (2009)	Surjadi et al. (2010)	Webb et al. (2007)
Sample Size (n)	34	16	22	633	110	155	1713	1196	33	155	43	90
Age												
Mean	42.94	46	37	39.3	39	40	45% 40 or older	35.7	39.8	40.7	48	38
SD	11.3	11.2	-	12.1	13	11.7	-	-	-	11.54	11.1	10
min - max	[26, 68]	-	-	[17, 70]	-	-	-	-	[25, 69]	[21, 71]	[22-67]	-
Gender												
Male	96.70%	100%	100%	100%	100%	100%	99%	99%	100%	100%	100%	100%
Race												
Caucasian	100%	-	-	100%	82%	-	91%	-	100%	95%	-	91%
Marital Status												
Single/other	83.90%	-	59.10%	82.70%	83%	-	62%	87.5%	73%	-	49.00%	62%
Married	16.10%	-	-	17.30%	17%	-	38%	13.5%	27%	-	51%	38%
Education												
Mean	-	averaged 12.7 years of education	Completed lower to middle levels	-	-	-	-	-	-	-	-	-
High School Grad	35.50%	-	-	-	16%	-	38%	-	-	-	30.30%	18%
College	45.20%	-	-	-	67%	-	21%	-	-	Mode=some college	30.30%	31%
Criminal History												
Mean		1 past offense	-	-	-	Intentionally discluded	-	-	-	-	-	-
History			-	-	35%	-	11%	-	26%	-	-	8%
No history	Majority low-risk		-	Low-risk	65%	-	87%	69%	74%	-	-	92%
Presentation of Mental Health												
Other		-	-	-	-	Intentionally discluded	-	-	-	-	-	-
No	2.90%	-	-	-	36%	-	89%	-	-	-	-	-
Yes	26.40%	-	-	-	64%	-	5%	-	-	-	-	37%

These data and other empirical data suggest child pornographers are predominantly Caucasian (Foley, 2002; Frei et al., 2005; Wolak et al., 2005). The N-JOV study reported that 91 percent of individuals arrested on child pornography charges were white (Wolak et al., 2005). In addition, both Bourke and Hernandez (2009) and Foley (2002) reported that over 95 percent of the of child pornographers in their samples were Caucasian. However, it should be noted that the current study was done in a predominantly Caucasian region. Future studies addressing and comparing the characteristics of child pornographers should be replicated in areas of greater racial diversity.

The percentage of married child pornographers is slightly lower than what has been found in past academic literature. The study performed in Lucerne, Switzerland that examined child pornographers who had utilized the services of Landslide Inc. found that 27 percent of the sample was married, while 73 percent of the sample was not (Frei et al., 2005). Researchers conducting the N-JOV study and Webb et al. (2007) both found 38 percent of offenders within their samples were married (Wolak et al., 2005). Henry and colleagues (2010) results suggested on 17.3 percent of child pornographers were married, while Surjadi and colleagues (2010) results suggested the highest percentage of married child pornographers at 53.7 percent. In future research, the inclusion of other categories such as widowed, divorced, or common law marriage would strengthen the findings.

The findings of this study also align with prior literature that have found that the majority of child pornographers have completed some form of higher education (Surjadi et al., 2010; Wolak et al., 2005). The N-JOV study specifically found that 42 percent of child pornographers had started and/or completed college, while only five percent had not completed high school (Wolak et al., 2005). Surjadi and colleagues (2010) found similar results with 30.3 percent

starting and/or completing college and only nine percent that had not completed primary education.

The majority of child pornographers appeared to be law-abiding citizens prior to being convicted (Bourke & Hernandez, 2009; Burke et al., 2002; Webb et al., 2007; Wolak et al., 2005). According to the results of the N-JOV study, only 11 percent of their sample had ever been arrested for a sex offense, only 22 percent of all subjects had been arrested for a nonsexual offense and only 11 percent had ever been known to be violent (Wolak et al., 2005). Those who have been arrested for a prior sex offense are more likely to be contact sexual offenders rather than child pornographers (Webb et al., 2007; McCarthy, 2010). However, non-contact offenders in Bourke and Hernandez's (2009) study admitted that if they had means to access minors and favorable circumstances, they likely would have committed a hands-on sexual offense.

The current study found that the majority of child pornographers have no prior offenses. This is similar to the results of Seto and Eke (2015) who found that only six percent of their sample had prior child pornography charges and 19 percent had previously been convicted for a different sexual offense. Despite these findings, it is important to note the study conducted by Bourke and Hernandez (2009) who found that child pornographers are often dual offenders who also engage in contact sexual offending. Due to this finding, future research should include qualitative analysis to better assess prior offending.

Research Question Two

Question two performed a comparative analysis between the characteristics of child pornographers and general offenders under federal supervision in North Dakota. Prior academic literature does not provide comparative analysis between child pornographers and general offenders. Therefore, justification for significance is challenging and would need further research

to determine causation within each characteristic. The findings for research question number two indicate that child pornographers are significantly older than general offenders. This finding may be the result of lower physical requirements necessary to commit child pornography versus other general offenses. Future research should be conducted to assess why there is a significant difference in age between child pornographers and general offenders.

In addition, child pornographers and general offenders have statistically significant differences in gender, race, mental health status, and criminal history. Specifically, child pornographers are nearly always males, Caucasian and have lower levels of mental health, and lower levels of prior offending. Results regarding mental health should be interpreted with caution due to the high volume of missing data. There was no statistically significant difference between child pornographers and general offenders for marital status or educational attainment.

It is unsurprising that child pornographers had higher levels of males and White individuals within their sample given prior academic literature finds the vast majority (typically over 90%) of child pornographers are male and Caucasian. The racial makeup of general offenders was 51.5 percent Caucasian and 40.8 percent American Indian or Alaska Native, while the racial makeup of child pornographers was 100 percent Caucasian.

It is interesting to note that while the prevalence of American Indians and/or Alaskan Natives was dominant in general offenses, they are not prevalent in child pornography related offenses. The lack of American Indians convictions related to child pornography could be a result of poverty and not having the means to access pornography (Trosper, 1996). However, this disparity in offense categories could also be the result of specific individual characteristics. Past research has demonstrated that there is very little variation in race for child pornography. Future research should be conducted in areas with greater racial diversity.

It was also noted that child pornographers and general offenders have a statistically significant difference in criminal history. As noted in research question number one, child pornographers rarely have past criminal histories and are unlikely to recidivate (Burke et al., 2002; Seto & Eke, 2015). However, it is important to note Bourke and Hernandez's (2009) study that found while 74 percent of 155 offenders had never been formally accused of committing a hands-on offense, 85 percent of offenders eventually acknowledged participation in a contact sexual offense with a minor. This finding shows the hidden nature of sexual offenses and the potential faults in the findings of this study regarding prior criminal history. Future research is needed to assess whether the criminal histories of child pornographers and general offenders are actually more similar than suggested in the current study.

Research Question Three

Similar to research question number two, research question number three was a comparative analysis of the characteristics of child pornographers and other sexual offenders. Research question number three indicates that there were no significant differences in age between child pornographers and other sexual offenders. These findings contradict the findings of Reijnen et al. (2009) and Webb et al. (2007) who found that child pornographers are significantly younger than other sexual offenders. Despite this contradiction, the current study's findings are consistent with McCarthy (2010) and Howitt and Sheldon (2007) who both found no statistical significance between the ages of child pornographers and contact sexual offenders. Of the four studies compared above, the largest sample size was 110 individuals. Future research should utilize larger sample sizes in order to obtain more accurate findings comparing the age of child pornographers and other sexual offenders.

The analysis found the vast majority of child pornographers and other sex offenders are male. This finding is consistent with previous research (Frei et al., 2005; Merdian et al., 2009; Wolak et al., 2005). Academic literature in regards to this topic is highly isolated to male offenders. Therefore, future research needs to be conducted with larger female sample sizes.

There was statistical significance found between child pornographers and other sexual offenders in regard to race. These findings are consistent with Webb et al. (2007) who found that contact sexual offenders were more racially diverse than the sample of child pornographers who were primarily Caucasian. However, McCarthy (2010) found no statistical significance in race between the 51 contact sexual offenders and 56 non-contact sexual offenders in a New York sex offender treatment program. As stated in the discussion of research question number one and two, future research on the characteristics of child pornographers and future research comparing the characteristics of child pornographers to other offenders needs to be conducted in areas with more racial diversity.

Much like the findings of marital status between general offenders and child pornographers, the marital status between child pornographers and other sexual offenders is relatively similar. This finding contradicts that of Reijnen and colleagues (2009) who found that child pornographers were less likely to have a significant other compared to contact sex offenders or nonsexual offenders. Child pornographers may be less likely to have a significant other due to their apparent antisocial tendencies, such as lack of remorse (Foley, 2002; Seto and Eke, 2005). A greater number of marital status categories should be utilized in future research in order to get a better understanding of marital status between child pornographers and other sexual offenders.

There was no statistically significant difference between the educational attainment and criminal history of child pornographers and other sexual offenders. The educational attainment finding aligns with McCarthy (2010) who was unable to find statistical significance in educational attainment between contact sexual offenders and child pornographers. Both child pornographers and other sexual offenders were found to have none to minimal prior criminal histories with the majority having criminal history numerals below III. Despite this finding, the underreporting of past sexual offenses was found in many empirical studies (Abel, Becker, Cunningham-Rathner, Rouleau, & Murphy, 1987; Ahlmeyer, Heil, McKee, & English, 2000; Kaplan, 1985).

Criminal histories of child pornographers and other sexual offenders may be greater than court records suggest. However, if child pornographers and other sexual offenders are committing more crimes than their records suggest, it is important to address why they are not being caught and convicted at the same rate as general offenders. The lack of prior criminal history could be due to the anonymity child pornography provides. Future research should evaluate why sexual offenders have such low rates of crime prior to being caught in comparison to general offenders.

The finding of significance between the mental health status of child pornographers and other sexual offenders aligns with studies performed by Bates and Metcalf (2007), Webb and Colleagues (2007), and Hart and Colleagues (1995). Bates and Metcalf (2007) found child pornographers have fewer cognitive distortions in comparison to other sex offenders. Webb and Colleagues (2007) and Hart and Colleagues (1995) both found that child pornographers exhibited fewer psychopathic traits compared to other sex offenders. Webb and Colleagues (2007) also found that child pornographers were more likely to make contact with mental health services that

other sex offender. However, the N-JOV study found a majority (89%) of child pornographers had never been diagnosed with a mental illness (Wolak et al., 2005). However, these mental health results should be regarded with extreme caution due to missing data for child pornographers. Overall, these analyses demonstrate that North Dakota similarly mirrors characteristics of child pornographers around the country and around the world.

Limitations

One of the most wide-reaching limitations was that data were limited to the day-to-day data collection procedures of the supervising agency which are for supervision reasons, and not for research reasons. The original plan for the current study included parental status, employment, childhood sexual abuse, substance abuse, and violations of parole data. Some of those data were not part of the data collection process for the agency and were therefore not able to be included within the current study. Additionally, some data were not collected due to the unforeseen Coronavirus pandemic which will be addressed in more detail later in this section.

This lack of data also affected sample size. The final sample of child pornographers consisted of 34 individuals. While this number is not unusual for child pornography research, it was not preferred (for example, see Reijnen et al., 2009; Howitt and Sheldon, 2007; Frei et al., 2005; Foley, 2002; Surjadi et al., 2010). This limitation especially affected bivariate analyses, as fewer cases led to limited variation across variable categories. In addition, the small sample size created fewer generalizable results.

The Coronavirus pandemic, otherwise known as COVID-19, greatly hindered the availability of data. Correction officials were forced to focus on addressing and responding to the requirements of supervision during a pandemic. In addition, COVID-19 created time constraints in the transfer of data and the speed in which this study was able to be completed.

Conclusion

The current study has highlighted the characteristics of child pornography offenders in the state of North Dakota. Further research is needed to guide policy and program initiatives to address child pornography. It is recommended that further analyses include parental status, employment, childhood sexual abuse, substance abuse, and violations of parole to help assist in identifying child pornographers. This study adds to the body of research about child pornography offenders and was the first study examining child pornographers in North Dakota.

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