GAMING LAW REVIEW AND ECONOMICS Volume 15, Number 10, 2011 © Mary Ann Liebert, Inc. DOI: 10.1089/glre.2011.151006 **Articles**

Problem Gambling in the Correctional System: A Brief Summary Report

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MONG THE MOST TROUBLESOME and least understood consequence of problem gambling is gambling-related crime. According to Abbott, McKenna, and Giles,¹ between one-third and twothirds of problem gamblers engaged in treatment or mutual help groups report having committed gambling-related offenses. Studies of the general population in Canada and in the United States have found that approximately 1% of the population may be pathological gamblers, and that between 2%and 3% of the population suffer from subclinical levels of gambling problems.^{2,3} Studies of correctional samples in the United States, Australia, New Zealand, and the UK tend to yield prevalence rates much higher than those in the general population.⁴ In a review of the literature on forensic populations, Williams, Royston, and Hagen⁵ found prevalence rates combining subclinical problem and pathological gambling ranging from 17% to 60%, with an average of approximately 33%.

The prevalence rates found in correctional populations are the highest found in any population studied to date. Gambling within the correctional facility appears to be quite common, despite rules against it. In Canada, gambling inside prison is not permitted because of the possibility of institutional violence over gambling. The concern over prison gambling is not, however, universal; Williams⁶ has argued that gambling in correctional facilities is largely harmless entertainment, and has

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even suggested that it should be permitted. One of the goals of this study was to determine the extent of gambling inside the correctional facility.

To better understand this population, Turner et al.,⁷ conducted a study of the federal correctional population in Canada. Turner et al., has reported the prevalence findings in the *Journal of Gambling* studies. In this article, we have summarized some of the key findings of Turner's study on prevalence and the relationship of gambling and crime. In addition, we report on the extent and nature of gambling that occurs within the correctional facility.

METHOD

Participants were 254 male offenders housed in an intake assessment unit of Correctional Service

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¹Abbott, M. W., McKenna, B. G., & Giles, L. C., *Gambling and problem gambling among recently sentenced male prisoners in four New Zealand prisons*, 21 J. GAMBLING STUD. 537–558 (2005).

²CANADIAN PARTNERSHIP FOR RESPONSIBLE GAMBLING, CA-NADIAN GAMBLING DIGEST 2007–2008 (2009). Retrieved Sept. 28, 2009 from the Canadian Partnership for Responsible Gambling Web site <http://www.cprg.ca/>.

³H. J. Shaffer, M. N. Hall & J. Vander Bilt, *Estimating the prevalence of disordered gambling behavior in the United States and Canada: a research synthesis*, 89 AM. J. PUB. HEALTH 1369–76 (1999).

⁴R. J. Williams, J. Royston & B. F. Hagen, *Gambling and problem gambling within forensic populations: A review of the literature*, 32(6) CRIM. JUST. & CRIM. BEHAV. 665–689 (2005). ⁵Id

⁶D. J. Williams, *Offender gambling in prisons and jails: Is it hidden leisure experience?* 40(3) CORRECTIONAL PSYCHOLO-GIST 7–10 (2008).

⁷N. E. Turner, D. L. Preston, C. Saunders, S. McAvoy & U. Jain, *The relationship of problem gambling to criminal behaviour in a sample of Canadian male federal offenders*, 25 J. GAMBLING STUD. 153–169 (2009).

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Canada. The assessment unit offers a complete cross section of males sentenced to a federal correctional facility in Ontario. As federal offenders, all participants had been convicted of offenses serious enough to result in a sentence of two years or more. The assessment unit is the reception center for recently convicted federal offenders in Ontario, and therefore is an ideal location to assess a large representative sample of recently sentenced federal offenders. Some federal offenders, particularly reoffenders, may have been undersampled, however, due to having been assessed previously and thus fast tracked through the assessment unit.

Volunteers for the study were solicited from offenders who were taking part in mandatory institutional orientation or educational assessment sessions. Other participants were randomly selected from the assessment unit population. Research assistants explained the study to the offenders, answered any questions, and solicited volunteers.

There were no inclusion criteria for the study, but offenders were excluded if language or reading comprehension difficulties precluded their ability to participate. A total of 651 offenders were asked if they would be interested in volunteering for the study. Seven people were excluded from the study because of difficulties with language or excessive missing values. A total of 254 offenders completed the study, for a completion rate of 39.0%. For each individual, it was made clear that the study was being conducted independently of the correctional institution, that participation was entirely voluntary, and that the results were confidential and would not be shared with institutional staff (unless required by law). The lack of coercion in participation is evident in the response rate of 39%. In addition, 106 offenders were interviewed in more depth about their gambling history and mental health. Interview participants included 23 severe problem gamblers, 30 moderate problem gamblers, 30 non-gamblers who were selected based on their questionnaire or file review information,8 and 23 randomly selected non-problem gamblers.9

Volunteers were then asked to complete a large series of questionnaires.¹⁰ The study took approximately one hour. Participants completed the questionnaires in small groups of 2 to10, but were seated at separate desks, spaced well apart. Researchers assisted anyone who needed help completing the questionnaires due to language or reading comprehension issues. In addition, we

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examined the offender's correctional file for information on the nature of the crimes committed and the length of their sentence.

PREVALENCE

The study included four measures of disordered gambling (see Table 1). According to the South Oaks Gambling Screen Revised (SOGS-R)¹¹ (past year), 4.7% of the sample scored as subclinical problem gamblers (3 or 4), while 13% of the sample scored as probable pathological gamblers (5 or more on SOGS-R). The Diagnostic and Statistical Manual of Mental Disorders: Fourth Edition, Text Revision (DSM-IV-TR)¹² indicated that 9.4% of the sample scored as subclinical problem gamblers (3 or 4) and 6.3% scored as pathological gamblers (5 or more). Finally, the $CPGI/PGSI^{13}$ found that 15.7% of the sample scored as moderate problem gamblers, and 9.4% scored as severe problem gamblers (8 or more). Although each of these measures provided different estimates of the prevalence of moderate and severe problem gambling, all estimates are significantly higher than would be expected in the general population.

When we accessed the offender's institutional files, only 3.5% (n=9) of the files listed gambling

⁸An offender who did not score in the problem gambler range was selected for an interview if their questionnaire results suggested extensive gambling in spite of low scores on the problem measure, or if gambling was mentioned in their file.

⁹We used a die to randomly select 1/6 of non-problem offenders for an interview.
¹⁰The questionnaire package for the current study was largely

¹⁰The questionnaire package for the current study was largely derived from a study with problem gamblers in the general population. N. E. Turner, U. Jain, W. Spence & M. Zangeneh, *Pathways to pathological gambling: Component analysis of variables related to pathological gambling*, 8(3) INT'L GAMBLING STUD. 281–298 (2008).

¹¹H. R. Lesieur & S. B. Blume, *Revising the South Oaks Gambling Screen in different settings*, 9 J. GAMBLING STUD., 213–233 (1993).

 $^{^{12}}$ We used the DSM-IV-TR questions as a self-report scale. These items have a high degree of internal consistency (alpha=0.85) and the total score is strongly correlated with the CPGI/PGSI and the SOGS-R. AMERICAN PSYCHIATRIC ASSO-CIATION. DIAGNOSTIC AND STATISTICAL MANUAL OF MENTAL DISORDERS: FOURTH EDITION, Text Revision (DSM-IV-TR) (2000).

¹³Problem Gambling Severity Index of the Canadian Problem Gambling Index. J. Ferris & H. Wynne, *The Canadian Problem Gambling Index: Final Report.* (Canadian Centre on Substance Abuse 2001), *available at* http://www.gamblingresearch.org>.

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TABLE 1. PERCENTAGES OF GAMBLING POPULATION SEGMENTS BASED ON DSM-IV-TR, SOGS-R, AND CPGI/PGSI (N=254)

	DSM-IV-TR past year	SOGS-R past year	CPGI/PGSI past year
Non-gambler	15.0	14.2	14.2
Non-problem gambler	48.4	46.5	38.2
Low level problem gambler	20.9	21.7	22.4
Moderate problem/ subclinical gambler	9.4	4.7	15.7
Severe problem/ pathological gambler	6.3	13.0	9.4

Note: For DSM-IV-TR, SOGS-R past year, and PGSI scores of 1 or 2, were classed as low problem. Moderate problem was defined as a score of 3 to 7 on the PGSI and a score of 3 or 4 on the DSM-IV-TR and SOGS-R past year. Severe problem gambling was defined as a score of 8 or more on the PGSI, or 5 or more on the DSM-IV-TR and SOGS-R past-year.

as a problem for the offender. Of those, just over half (n=5) scored in the severe problem gambler range of the CPGI/PGSI; the rest were either nonproblem (n=2) or low risk problem gamblers (n=2). This means that the correctional institution was only aware of gambling as an issue for 5 out of the 24 offenders (21%) who scored in the severe problem gambling range of the CPGI/PGSI. In total, institutional charges for gambling were noted for 1.6% of the offenders (n=4). Only one of the people with institutional charges scored in the severe problem gambling range of the CPGI/PGSI. These findings suggest that the correctional institution is largely unaware of the extent of gambling problems amongst the offenders.

While gambling within correctional institutions is officially not permitted, the results indicate that it is nevertheless quite common. Although commercial forms of gambling are not available in correctional facilities, 38.5% reported gambling while in prison. Gambling in the correctional facility was correlated with severity of problem gambling prior to incarceration, rho=0.35, p<0.001. The most common games played in prison were card games (33.2%), sports bets (13.9%), and other games, such as dice (7.4%). Severe problem gamblers were most likely to report having problems with card games and sports betting while in prison.

CRIME AND GAMBLING

On average, the offenders were serving time for 5.1 (SD=5.8) offenses, had been convicted of an

average of 23.1 (SD=20.5) offenses in their lifetime, and were currently sentenced to 219.6 weeks (SD=220.5) of incarceration with a median of 147 weeks.¹⁴ There was also a significant negative correlation between being a first time offender and CPGI/PGSI scores, rho = -0.16, p<0.001, suggesting that more severe problem gamblers are more likely to be repeat offenders.

The mean number of violent offenses committed in their lifetime was 3.7 (SD=4.1), and the mean number of income-producing offenses was 9.4 (SD=11.7). On average, severe problem gamblers had been convicted of 15.0 (SD=10.3) incomeproducing offenses, whereas non-problem gamblers had been convicted of 8.1 (SD=11.7) incomeproducing offenses. There was a significant correlation between CPGI/PGSI scores and the number of income-producing offenses, rho=26, p<0.001, and other offenses, rho=0.13, p<0.05, but no correlation with the number of violent offenses. That is, problem gamblers were neither more nor less likely to have committed violent offenses than other offenders.

Table 2 displays the type of offenses committed broken down by the CPGI/PGSI categories. The conviction information was obtained through a review of the offender's institutional file. It is of note that very few of the severe problem gamblers committed murder or sexual assault. Nonetheless, half of them had been convicted of robbery. For the severe problem gamblers, 3 out of 4 people charged with assault were also charged with robbery. In contrast amongst non-gamblers, only 1 person out of 18 charged with assault was also charged with robbery. These findings suggest that severe problem gamblers commit violent crimes primarily in order to obtain income.

Other analyses indicated that alcohol problems¹⁵ were correlated with violent (rho=0.17, p<0.001), income-producing (rho=0.16, p<0.01), and other crimes (rho=0.30, p<0.001). Drug problems¹⁶

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¹⁴This figure includes 15 offenders who had sentences of an indeterminate length (i.e., "life"). We substituted 20 years (1,040 weeks) for these offenders. Excluding these 15 offenders, the mean was 168.8 weeks (SD=84.6).

¹⁵Measured using the PRD, which is described in F. H. Porporino, D. Robinson, M. A. Millson & J. R. Weekes, *An outcome evaluation of prison-based treatment programming for substance users*, 37 Use & MISUSE 1047–1077 (2002).

¹⁶Measured using the Drug Abuse Screening Test (DAST), which is described in H. A. Skinner, *Drug Abusing Screening Test*, 7 ADDICTIVE BEHAV. 363–371 (1982).

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Major offense category	Non-gambler	Non- problem	Low problems	Moderate problems	Severe problems	Total
Murder & attempted murder	8.3%	11.3%	10.5%	10.0%	0.0%	9.4%
Sexual assault	19.4%	14.4%	12.3%	2.5%	4.2%	11.8%
Assault	22.2%	18.6%	17.5%	15.0%	16.7%	18.1%
Extortion	2.8%	1.0%	1.8%	0.0%	0.0%	1.2%
Robbery	27.8%	22.7%	31.6%	50.0%	50.0%	32.3%
Fraud	25.0%	19.6%	8.8%	25.0%	33.3%	20.1%
Forgery	8.3%	7.2%	5.3%	7.5%	4.2%	6.7%
Theft	50.0%	43.3%	52.6%	80.0%	79.2%	55.5%
Possession of property	30.6%	45.4%	35.1%	55.0%	79.2%	45.7%
Drug trafficking	11.1%	20.6%	22.8%	20.0%	12.5%	18.9%
Break and enter	22.2%	27.8%	21.1%	50.0%	58.3%	31.9%
Counterfeit	0.0%	0.0%	0.0%	5.0%	4.2%	1.2%

 TABLE 2. MAJOR OFFENSE CATEGORIES BY CPGI/PGSI GAMBLER SUBGROUPS

Note: Assault includes conspiracy to commit assault. Possession of property refers to items obtained through crime. Murder includes first degree murder, second degree murder, attempted murder, and manslaughter.

were correlated with violent (rho=0.13, p<0.05), income-producing (rho=0.42, p<0.001), and other crimes (rho=0.37, p<0.001).

In addition, during the interview, the offenders were asked about the relationship between their gambling and their crime. Nearly two-thirds (65.2%) of the severe problem gamblers reported that gambling led directly to some of their criminal behavior. Many report being trapped in a cycle of gambling debt and crime. As one offender put it, gambling led to debt, debt led to crime, and around it goes. In contrast, only 20% of moderate problem gamblers reported that gambling lead to their criminal behavior. More than one-third of the moderate problem gamblers, and over 20% of the nonproblem gamblers, reported that gambling was part of their criminal lifestyle. For example, they gambled because their criminal associates also gambled. In addition, many reported taking part in illegal gambling operations, such as card rooms and sportsbooks.

CONSEQUENCES OF GAMBLING INSIDE

As part of the interview, we asked offenders about the possible consequences of gambling that they or other offenders had experienced within the correctional institution.¹⁷ Responses to the latter question were a mix of hearsay evidence and consequences actually witnessed. As indicated in Table 3, consequences of institutional gambling were varied, and ranged from personal distress to loss of a meal or canteen item, to severe physical harm or threats of violence against family members in the commu-

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nity. Most of the offenders interviewed (72.9%) reported not having actually experienced any consequences from gambling in prison; however, many reported being aware that physical harm (80.4%)and threat of physical harm (56.1%) could result from gambling. Although 39.3% of offenders reported that segregation was a possible consequence of gambling if caught by prison guards, less than 1% reported having experienced it (n=1). The file review found only four references (1.6%) to institutional charges related to gambling. However, 7.5% (n = 8) of the offenders reported that they had received institutional charges related to gambling. This discrepancy may be related to how the charges were recorded. Behaviors that were the *result* of gambling, such as violence or possession of another's property related to debt collection, may have been recorded violence or possession of property, and not recorded as related to gambling.

It is also noteworthy that, in spite of the awareness that potential consequences of institutional gambling can be quite serious, nearly 40% of the offenders report gambling inside the correctional facility.

DISCUSSION

The results from this study¹⁸ and from other previous studies summarized by Williams et al.,¹⁹

¹⁷This interview question was an open-ended question. The results were coded and organized by the two interviewers. ¹⁸Turner et al., *supra* note 7.

¹⁹Williams et al., *supra* note 4.

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Consequence $(N = 106)$	First-hand experience (%)	Second-hand experience (%)
None mentioned	72.9	8.4
Physical harm	12.1	80.4
Threat of physical harm	17.8	56.1
Institutional charges	7.5	5.6
Segregation/transfers/range change	0.9	39.3
Involving family to pay debt	9.3	11.2
Financial consequences/interest	13.1	7.5
Loss of meal or canteen item	8.4	14.0
Social/institutional reputation	10.3	24.3
Threats to family on outside due to debt	_	8.4
Loss of personal item	1.9	7.5
Interpersonal conflicts, not including violence	_	13.1
Significant stress, anxiety, or depression	11.2	_

TABLE 3. CONSEQUENCES OF GAMBLING IN PRISON: FIRST AND SECOND HAND EXPERIENCES

Note: Participants could give multiple responses so the percentages do not add up to 100%. *First-hand experiences* are events the person has actually been involved in. *Second-hand experiences* may include events that the person has witnessed, but also may include speculation and rumors. The *second-hand experiences* cannot be used as a proxy for how common that event is because all instances may refer to the same event.

indicate that the prevalence of gambling problems is very high amongst adult offenders. The prevalence estimate of disordered gambling varies depending on the instrument used. The SOGS-R yielded the highest estimate of probable pathological gambling. The DSM-IV yielded a relatively low estimate of 6.3%. All of these figures are valid estimates, but they vary in terms of the placement of an arbitrary line between the milder, subclinical problem gamblers and the more severe, pathological gamblers. The true prevalence figure is most likely somewhere between these estimates. The CPGI/PGSI appears to be a good compromise between the DSM-IV-TR and the SOGS-R. When considering the differences between these estimates, it is important to realize that a person who scores slightly under the threshold for a particular measure (e.g., a DSM-IV-TR score of 4) is not problem free, but most likely has a slightly milder case of the disorder than someone who scores 5 on the DSM-IV-TR.

The link between gambling and crime is wellknown.^{20,21,22} In previous studies, the most commonly reported gambling-related offenses were "income producing," such as theft, fraud, counterfeiting, and embezzlement.^{23,24} The current study replicated those findings, but also found that half of the severe problem gamblers had engaged in the violent income producing crime of robbery.

Williams²⁵ has argued that gambling in correctional facilities is largely harmless entertainment and suggests that it should be permitted. This may well be true for the non-problem gamblers. One point that emerges from this research is that entering a correctional facility is not likely to lead to abstinence from gambling. Although commercial forms of gambling are for the most part not available in the correctional facilities, nearly 40% of the offenders reported gambling while incarcerated. According to them, there is a wide range of potential negative consequences resulting from gambling in the correctional facility. In particular, the relationship between gambling and institutional violence needs to be addressed. Most alarmingly, over 80% of the offenders reported that physical harm could occur as a result of disputes related to gambling. However, this figure is based mostly on hearsay evidence (e.g., witnessing a fight or hearing about it from others), rather than direct experience and may be exaggerated.²⁶ Nonetheless 12.1% of the

²⁰P. Ferentzy & N. E. Turner, *Gambling & Organized Crime—a review of the literature*, 23 J. GAMBLING ISSUES 111–156 (2009).

²¹H. Humphrey-Jones & M. A. Slawik, Crossing the line: When gamblers turn to crime (2008).

²²Williams et al., *supra* note 4.

²³Y. Sakurai & R. G. Smith, Gambling as the motivation for the commission of financial crime, AUSTRALIAN INSTITUTE OF CRIMINOLOGY: TRENDS AND ISSUES IN CRIME AND CRIMINAL JUSTICE, No. 256. (2003).
²⁴G. Smith, H. Wynne & T. Hartnagel, Examining police re-

^{2*}G. Smith, H. Wynne & T. Hartnagel, *Examining police records to assess gambling impacts: A study of gambling-related crime in the city of Edmonton.* A report prepared for the Alberta Gaming Research Institute (2003).

²⁵D.J. Williams, Offender gambling in prisons and jails: Is it hidden leisure experience? 40(3) CORRECTIONAL PSYCHOLO-GIST 7–10 (2008).

²⁶For example, one very public violent event could result in most people endorsing the item. Thus, just because most people report that violence is possible, does not mean that violence is very common.

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offenders interviewed reported experiencing actual physical harm related to their gambling activities, and another 17.8% reported receiving threats related to gambling. The relative lack of awareness regarding institutional charges specifically related to gambling (5.6%) could be due to the fact that correctional staff typically turn a blind eye to gambling as it occupies offenders and, for the most part, keeps the institution quiet. Permissive staff attitudes toward gambling may also be due to the fact that it is relatively common and legally sanctioned outside of prison.

In the present study, severe problem gamblers were somewhat more likely to be repeat federal offenders. It seems likely that incarcerated offenders who suffer from an unresolved gambling problem may continue to gamble problematically upon release. Consequently, they may end up reoffending as a result of their gambling problem. Very few services related to gambling are currently available for offenders in the correctional facility, which further compounds the probability of continuing their gambling behavior. One clear result from this study is that the current approach to this issue within corrections—banning gambling—is not working as a means of controlling it.

Significantly, this study found that the majority (65%) of offenders scoring in the severe problem range on gambling measures reported that gambling led directly to some of their criminal choices. Others report being caught in a cycle of gambling, debt, and crime. Some efforts have been made to offer problem gambling offenders a means out of their cycle. One of the most notable examples is that of Judge Mark Farrell in Buffalo, New York.^{27,28} In his gambling court program, offenders are offered the option of attending treatment ser-

vices for problem gambling instead of being incarcerated. The offenders examined in the current study, however, generally had long criminal careers, and many had committed violent crimes. Thus, they would not likely be suitable candidates for a gambling court. However, it is argued that for many of them, if they had a treatment alternative to prison at an earlier stage in their criminal career, they may not have ended up in a federal correctional facility. Another approach to dealing with this problem is to provide treatment services for offenders with a gambling problem, either during incarceration or upon release. We know of two correctional institutions in Ontario which offer treatment services to offenders. Further research to determine the best approaches for controlling gambling in correctional facilities is needed. Currently, it appears that gambling inside is a relatively popular and common activity, which may mean that complete abstinence, individually and systemically, could be difficult to achieve.

ACKNOWLEDGMENTS

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²⁷A description of this program can be found at <http:// www.gamblingcourt.org/farrellCV.php>.

²⁸C. D. Hinshaw, Taking a Gamble: Applying Therapeutic Jurisprudence to Compulsive Gambling and Establishing Gambling Treatment Courts, 9(4) GAMING L. REV. 333–342 (2005).

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