

Problem gambling: What do we know? Griffiths, MD GamingIntelligence.com 05/12/08

Special Feature: By Dr Mark Griffiths. Gambling is an activity that is popular across many cultures. Worldwide, national gambling prevalence surveys have tended to conclude that there are more gamblers than non-gamblers, but that most participants gamble infrequently. Some regular gamblers persist in gambling even after repeated losses and develop significant, debilitating problems that typically result in harm to others close to them and in the wider community.

The introduction of national lotteries, new casinos, the proliferation of electronic gaming machines, and the introduction of remote gambling (e.g., Internet gambling, mobile phone gambling, interactive television gambling), has greatly increased the accessibility and popularity of gambling all over the world. As a consequence, the number of people seeking assistance for gambling-related problems has increased. Government commission studies in a number of countries including the United States, United Kingdom, Australia and New Zealand have all concluded that (in general) increased gambling availability has led to an increase in problem gambling although the relationship is complex and non-linear.

Estimates of the number of problem gamblers vary from 0.6% in Great Britain, 1.1% to 1.9% in the U.S., and 2.3% in Australia. These surveys have also indicated that problem gambling is twice as common among males as it is among females, that non-whites have higher rates than whites, and that those with poor education are more likely to be problem gamblers. Research has consistently shown that problem gambling can negatively affect significant areas of a person's life, including their physical and mental health, employment, finances and interpersonal relationships (e.g., family members, financial dependents). Research has also shown that there are also significant co-morbidities with problem gambling, including depression, alcoholism, and obsessive-compulsive behaviours. These co-morbidities may exacerbate, or be exacerbated by, problem gambling. Problem gamblers may also suffer irrational distortions in their thinking (e.g., denial, superstitions, overconfidence, or a sense of power or control). Recent research has also shown that those who use the Internet to gamble are more likely to be problem gamblers. The most probable explanation is that the 24/7 accessibility of the medium provides 'convenience' gambling for those gamblers who already have a susceptibility or vulnerability to gambling.

The acquisition, development and maintenance of problem gambling is an area that is continually disputed by researchers. The exact causes and reasons for continuing gambling behaviour seem to be dependent upon the individual, but there does seem to be some general underlying factors and re-occurring themes. Problem gambling generally begins in adolescence and may start following a major life stress, for example the death of a parent or birth of a first child.

Despite the recognition of the complexity of gambling behaviour, most research in the area has been confined to narrow areas of specialisation. However, more recently, researchers across the world appear to agree that problem gambling occurs as a result of many different influences including biological factors (e.g., genetic predispositions), psychological factors (e.g., personality factors, thinking styles, attitudes toward gambling) and sociological factors (e.g., parental/peer influence, social environment in which the person was raised). In addition to these 'biopsychosocial' factors, problem gambling can also be influences by situational factors of the gambling environment and structural factors of the game itself.

Almost all surveys of gambling have shown that these broad motivational factors are central to gambling and that attitudes towards gambling are positively related to availability and cultural acceptability. However, this

perspective fails to take into account many key findings and observations in gambling research. Research has consistently shown that people often gamble for reasons other than broad social and economic reasons. These other motivations may vary according to personal characteristics of the gambler and the type of gambling activity. Finally, broad social and economic theories fail to explain why certain gambling activities are more popular or "addictive" than others.

Typically, gambling has been more popular in lower socio-economic groups, in Catholics rather than Protestants, among unmarried people, in younger age groups, and in men. Consistent with trends observed in overall participation rates, research has found that the incidence of gambling-related problems is considerably higher in lower socio-economic groups and in younger people, and it is more likely to be associated with slot machines, one of the few activities which attract similar numbers of men and women.

Another factor central to understanding gambling behaviour is the structure of gambling activities. Gambling activities vary considerably in their structural characteristics, including the probability of winning, the amount of gambler involvement, the amount of skill that can be applied, the length of the interval between stake and outcome, and the magnitude of potential winnings. Structural variations are also observed within certain classes of activities such as slot machines, where differences in reinforcement frequency, colours, sound effects and machines' features can influence the profitability and attractiveness of machines significantly. In the case of Internet gambling, players gamble with 'e-cash' (lowering the psychological value of the money), event frequencies can be very high (such as simulated slot machines with 30-40 spins per minute), and play is anonymous and non-face-to-face (meaning that other people cannot see the gambler lose).

Each of these structural features may (and almost certainly does) have implications for gamblers' motivations and the potential "addictiveness" of gambling activities. Internationally, the greatest problems are, to a very considerable degree, associated with non-casino electronic gaming machines (EGMs) such as slot machines, 'pokies' and video lottery terminals. It has been found that as EGMs spread, they tend to displace almost every other type of gambling as well as the problems that are associated with them.

Another vital structural characteristic of gambling is the continuity of the activity; namely, the length of the interval between stake and outcome. In nearly all studies, it has been found that continuous activities (e.g., racing, slot machines, casino games) with a more rapid play-rate are more likely to be associated with gambling problems. The ability to make repeated stakes in short time intervals increases the amount of money that can be lost and also increases the likelihood that gamblers will be unable to control spending. Such problems are rarely observed in non-continuous activities, such as weekly or bi-weekly lotteries, in which gambling is undertaken less frequently and where outcomes are often unknown for days. Consequently, it is important to recognise that the overall social and economic impact of expansion of the gambling industry will be considerably greater if the expanded activities are continuous rather than non-continuous.

Other factors important to the understanding gambling behaviour are the situational characteristics of the gambling environment. These are the factors that often facilitate and encourage people to gamble in the first place. Situational characteristics are primarily features of the environment (e.g., accessibility factors such as location of the gambling venue, the number of venues in a specified area and possible membership requirements) but can also include internal features of the venue itself (e.g., décor, heating, lighting, colour, background music, floor layout, refreshment facilities) or facilitating factors that may influence gambling in the first place (e.g., advertising, free travel and/or accommodation to the gambling venue, free bets or gambles on particular games) or influence continued gambling (e.g., the placing of a cash dispenser on the casino floor, free food and/or alcoholic drinks while gambling). These variables appear to be important in both the initial decision to gamble and the maintenance of the behaviour. Internet gambling alters the situational characteristics of gambling by providing 'convenience' gambling. People can gamble from the comfort of their own home without having to travel, dress any way they like, and drink and/or smoke concurrently while gambling without sanctions.

Although many of these situational characteristics are thought to influence vulnerable gamblers, there has been very little empirical research into these factors and more research is needed before any definitive conclusions can be made about the direct or indirect influence on gambling behaviour and whether vulnerable individuals are any more likely to be influenced by these particular types of marketing ploys.

This brief overview highlights that problem gambling is a highly complex behaviour that is not only influenced by individual 'biopsychosocial' risk factors, but also by the situational factors of the gambling environment, and structural characteristics of the gambling activity itself.

## About the author

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Professor Griffiths is internationally known for his work on gambling, winning many awards including the American 1994 John Rosecrance Research Prize for "outstanding scholarly contributions to the field of gambling research", the 1998 European CELEJ Prize for best paper on gambling, the 2003 Canadian International Excellence Award for "outstanding contributions to the prevention of problem gambling and the practice of responsible gambling" and a North American 2006 Lifetime Achievement Award For Contributions To The Field Of Youth Gambling "in recognition of his dedication, leadership, and pioneering contributions to the field of youth gambling".

He has published over 200 refereed research papers, a number of books, over 50 book chapters and over 550 other articles. He has served on numerous national and international committees (e.g. BPS Council, BPS Social Psychology Section, Society for the Study of Gambling, Gamblers Anonymous General Services Board, National Council on Gambling etc.) and is a former National Chair of Gamcare.

## **Bibliography**

Abbott, M.W. (2007). Situational factors that affect gambling behavior. In G. Smith, D. Hodgins & R. Williams (Eds.), Research and Measurement Issues in Gambling Studies. pp.251-278. New York: Elsevier.

Griffiths, M.D. (2006). An overview of pathological gambling. In T. Plante (Ed.), Mental Disorders of the New Millennium. Vol. I: Behavioral Issues. pp. 73-98. New York: Greenwood.

Griffiths, M.D. (2007). Gambling Addiction and its Treatment Within the NHS. London: British Medical Association.

Griffiths, M.D. & Parke, J. (2003). The environmental psychology of gambling. In G. Reith (Ed.), Gambling: Who wins? Who Loses? pp. 277-292. New York: Prometheus Books.

Griffiths, M.D. & Delfabbro, P. (2001). The biopsychosocial approach to gambling: Contextual factors in research and clinical interventions. Journal of Gambling Issues, 5. Located at: www.camh.net/egambling/issue5/feature/index.html.

Parke, J. & Griffiths, M.D. (2007). The role of structural characteristics in gambling. In G. Smith, D. Hodgins & R. Williams (Eds.), Research and Measurement Issues in Gambling Studies. pp.211-243. New York: Elsevier.

Wardle, H., Sproston, K., Erens, B., Orford, J., Griffiths, M.D, Constantine, R. & Piggott, S. (2007). The British Gambling Prevalence Survey. London: The Stationery Office.