An Overview of Casino and Gambling

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Abstract: A significant number of individuals engage in the gaming sector due to its association with financial prosperity. The gambling sector has experienced significant growth, leading to a heightened interest among the general public in its wealth and prosperity. Casinos that generate annual revenues in the billions have demonstrated remarkable resilience in the face of economic downturns. This research paper aims to investigate a relatively obscure domain within the gaming industry. It will employ a combination of scholarly theoretical analysis and empirical research to examine various aspects, including game categorization, the mechanics of gaming machines, effective marketing strategies employed by casinos, and the interplay between perceptions of gambling, psychological profiles, and behavioral patterns. The paper additionally investigates the efficacy of doubling and continuous betting techniques and provides recommendations pertaining to the marketing, management, and regulation of the gaming business.

Keywords: gambling industry, psychological profiles, Casinos

1. Introduction

The burgeoning gaming sector has captivated the general population with its opulence and prosperity. Casinos that generate annual revenues in the billions have demonstrated remarkable resilience in the face of economic downturns. Researchers have undertaken investigations into several subjects in order to gain a deeper comprehension of the factors contributing to the success of the sector [1]. These include the examination of operational models, corporate strategy, and customer behavior, among others. The decryption of these enigmas has the potential to enhance our understanding of the factors contributing to the prosperity of the casino sector, along with the implications it has on broader domains such as economics, marketing, and psychology. These additional domains could also benefit from acquiring a more comprehensive understanding of the variables that contribute to the prosperity of the casino industry. Furthermore, when conducting an analysis of the gaming industry, it is imperative to explore the prospects of achieving success within this sector. Gambling can be characterized as a form of entertainment with the element of chance, when individuals willingly risk their personal finances with the expectation of obtaining a greater monetary return than their initial investment. A comprehensive comprehension of the probabilities associated with achieving success in different casino games is vital for both individuals engaged in gaming activities and those involved in commercial professions. This research paper aims to investigate a lesser-explored domain within the gaming industry. It will employ a combination of scholarly theoretical analysis and empirical research to examine various aspects, including game categorization, gaming machine mechanics,

effective marketing strategies employed by casinos, and the interplay between gambling perceptions, psychological profiles, and behaviors. The paper additionally investigates the efficacy of doubling and continuous betting techniques and provides recommendations pertaining to the marketing, management, and regulation of the gaming business.

2. Literature Review

The study conducted by Tian Po Oei, James Lin, and Namrata Raylu aimed to examine the impact of gambling cognitions and psychological states on problem gambling behavior [2]. The research involved a sample of 501 participants, consisting of 306 Caucasians and 195 Chinese individuals residing in Australia [3]. The participants completed three assessment tools: the South Oaks Gambling Screen, the Depression, Anxiety, and Stress Scale (DASS), and the Gambling Related Cognitions Scale (GRCS). The study revealed a significant positive correlation between the Gambling Related Cognitions Scale (GRCS) and the Depression Anxiety Stress Scales (DASS) in connection to problem gambling behavior. This observation applied to both cohorts. Significant gender disparities were observed in anxiety, stress, and the perception of control, which were consistent across both ethnic cohorts.

In the article authored by Howard Rachlin, Vasiliy Safin, Kodi B, Arfer, and Ming Yen [4], the authors posit that when a repeated gambling activity is organized into units, wherein each unit comprises a series of consecutive losses followed by a solitary win, it can be inferred that longer sequences of consecutive losses will inherently possess diminished value. The impact of delay will be more detrimental to longer strings with lower value than to shorter strings with higher value. This suggests that when the discount applied to the delay increases, the estimated value of the entire wager will also increase. As a result of this rearrangement, it is conceivable that games with a perceived negative expected value, such as those commonly encountered in casinos, may elicit a perception of positive expected value for the player. The subjective value of the gamble exhibits a proportional increase with the steepness of the delay discounting, when contrasted with the typical ranges of discounting steepness. Due to the strong attachment that regular gamblers have towards gambling, it can be inferred that they will have a greater tendency to devalue delayed rewards compared to individuals who do not engage in betting activities [4].

3. Successful Marketing Strategies for Casinos

During the early 1960s, the gambling market in the United States was characterized by a limited scope, wherein only a select number of legally permissible forms of gambling were accessible, including bingo and horse racing. Nevada has faced scrutiny and criticism due to its historical association with organized crime, despite the presence of a legitimate casino sector within the state [5]. During the 1970s, a notable transformation took place in the legal landscape, exemplified by Nevada's pioneering decision to permit publicly traded companies to obtain gambling licenses and New Jersey's historic legalization of casino gaming in Atlantic City. This transformation facilitated a period of unparalleled growth in the subsequent decades. The proliferation of casinos throughout different states can be attributed to the implementation of initiatives, referendums, and legislative measures. Approval was granted for Indian casinos, riverboat casinos, and small-stakes casinos situated in mining villages across various regions. Furthermore, the legislation allowed for the legalization of slot machines and electronic gaming devices in locations other than casinos, leading to the emergence of video poker machines in bars and taverns. There has been a notable shift in public perceptions on gambling, accompanied by a reduction in the negative associations between casinos and organized crime, which can be attributed to changes in ownership structures. Analogous trends of casino legalization and expansion were witnessed in other nations, including the United Kingdom, Australia, and Canada [5].

The measurement of the house advantage, which signifies the long-term cost incurred by customers, can be conducted by employing probability analysis and player strategies. Fixed odds games, such as roulette, wheel of fortune, dice games, and slot machines, possess inherent house advantages that cannot be altered. Progressive payment games, such as certain slot machines and lottery-style games, exhibit varying house advantages that correspond to the incremental growth of the jackpot amount. Certain games require players to engage in strategic decision-making, hence exerting an influence on the house advantage. Examples of such games include blackjack and video poker. According to a research [5], it presents a comprehensive analysis of diverse games, encompassing crucial statistical characteristics such as the house advantage, standard deviations, and percentage deviations from the house advantage. This information offers valuable insights into the extent of unpredictability in results associated with different types of wagers.

As indicated in Table 1, following the completion of 1,000 conventional wagers on the "pass line" in the game of craps, wherein the participant places bets on the likelihood of the dice shooter emerging victorious, the mean outcome would manifest as a deficit of 14 units, equivalent to 1.4% of the cumulative amount wagered. The results of these wagers exhibit a standard deviation of 31.6 units, which corresponds to 3.16% of the total amount gambled. The Central Limit Theorem states that in the context of a significant number of trials, the aggregate result of the game may be estimated using a normal distribution. Based on this estimation, it can be inferred with a 95.5% level of confidence that following 1,000 iterations, the player's true performance will lie within a range of being 49 units ahead and 77 units behind. Stated differently, the anticipated loss of 14 units may exhibit variability within a range of two standard deviations. Based on the available data, it can be estimated that the probability of the player being in a leading position at this juncture is around 33% [5].

4. The Relationship among Gambling Cognitions, Psychological States, and Gambling

In the following paper, the author discusses the range of legal gambling alternatives available in Australia, which are overseen by state and territory governments. These possibilities include casinos, lotteries, and gaming machines [6]. Ethnic communities, particularly the Chinese population, exhibit elevated levels of gambling and problem gambling, displaying a preference for casinos over gaming machines. Nevertheless, there is a scarcity of evidence regarding these habits among this particular demographic. Gambling initiation and persistence are significantly influenced by two pivotal elements, namely gambling cognitions and psychological states such as despair and anxiety. Individuals with gambling problems frequently possess erroneous beliefs on their ability to influence the results of gaming activities, hence perpetuating their engagement in gambling while experiencing financial losses [7]. These cognitive processes encompass beliefs on the ability to exert control or make predictions about future events, as well as the tendency to reinterpret gambling outcomes in a way that fosters continued participation. Equally significant are the expectations regarding the effects of gambling, which frequently mirror cognitive distortions observed in individuals with substance use or mood-related problems. Psychological conditions, such as stress, sadness, and anxiety, are known to be associated with problem gambling; nevertheless, the exact nature of their causative linkages remains uncertain [7].

Research findings indicate a notable prevalence of elevated levels of depression and contemplation of suicide among those who actively seek assistance for their gambling behavior. It has been observed that a considerable proportion of these individuals' resort to gambling as a means of managing stress, depression, or anxiety. Gender disparities in gambling habits are also observed, with men exhibiting elevated levels of gambling cognitions, while women tend to experience heightened affective difficulties. A comparative analysis was undertaken to examine the gambling cognitions and psychological states of Chinese and Caucasian individuals residing in Australia. The study used a sample of 501 people from Brisbane. The study posited that there would be a positive correlation

between gambling activity and erroneous cognitions as well as psychological states, as measured by the South Oaks Gambling Screen, the Gambling Related Cognitions Scale, and the Depression Anxiety Stress Scale. Additionally, the study proposed that there were higher levels of gambling cognitions observed among the Chinese participants, as well as gender disparities in affective issues and gambling cognitions. The findings unveiled noteworthy associations among problem gambling, gambling cognitions, and psychological states. There was a positive correlation observed between stronger belief in gambling-related cognitions and higher stress levels, and higher problem gambling levels. Notably, these connections were found to be more pronounced in the Chinese group, as indicated in Table 1. The findings of the regression analysis indicated that ethnicity, gambling cognitions, and stress levels emerged as important predictors of problem gambling, while gender did not demonstrate a significant association [7].

Table 1: Means and Standard Deviations	(Including Gender	Differences)	for the C	aucasian and
Chinese Groups [8].				

		Men		Women		Total
Variables	Caucasian	Chinese	Caucasion	Chinese	Caucasian	Chinese
	(n=107)	(n=71)	(n=199)	(n=124)	(n=306)	(n=195)
SOGS-T	1.64(2.72)	2.04(2.72)	0.96(2.03)	1.06(1.99)	1.20(2.31)	1.42(2.33)
DASS-T	28.30(21.91)	31.77(21.50)	32.25(26.47)	32.06(23.05)	31.05(25.02)	31.96(22.74)
DASS-D	9.00(9.07)	9.10(7.49)	9.53(10.05)	9.90(9.25)	9.34(9.70)	9.61(8.64)
DASS-A	6.75(7.22)	10.34(7.44)**	8.39(8.57)	9.97(9.25)	7.82(8.15)	10.10(7.63)**
DASS-S	12.56(8.59)	12.34(7.44)	14.60(10.12)	12.19(8.92)*	13.89(9.64)	12.25(8.82)
GRCS-T	47.87(18.73)	50.2(23.70)	41.68(19.85)	42.97(21.43)	43.51(19.69)	45.60(22.49)
GRCS-IS	6.93(4.27)	8.18(5.07)	6.06(4.06)	6.90(3.65)	6.36(4.15)	7.37(4.25)**
GRCS-IB	8.86(5.69)	8.60(5.27)	6.93(4.83)	7.56(4.85)	7.61(5.21)	7.94(5.02)
GRCS-IC	5.96(3.15)	8.27(5.10)**	6.23(4.16)	6.90(4.15)	6.14(3.83)	7.40(4.55)**
GRCS-GE	11.25(5.04)	10.13(5.81)	8.22(4.67)	7.84(4.42)	9.28(5.01)	8.67(5.08)
GRCS-PC	14.87(6.59)	15.02(7.35)	13.73(7.15)	13.77(11.14)	14.13(6.97)	14.22(9.93)

The aforementioned discoveries highlight the importance of cultural elements and psychological states, such as stress, in exerting a major impact on gambling behavior. Moreover, it is worth noting that these affects tend to be more pronounced among certain cultural groups. The study identifies several areas that could be considered for intervention and preventative measures. However, it also presents findings that contradict earlier research on the role of gender as a significant predictor. Therefore, additional investigation is necessary to explore this discrepancy. This statement underscores the importance of taking cultural elements into account when examining gambling behavior and developing solutions. Additionally, it highlights the necessity for further investigation into the interplay between cultural influences and psychological states in shaping gambling behavior [8].

5. Conclusion

This study aimed to investigate a relatively obscure domain within the gaming sector by integrating scholarly theoretical frameworks and empirical research methods. The research endeavors to analyze the various genres of games prevalent in the gaming industry, elucidate the operational mechanisms of gaming machines, evaluate the effective marketing strategies employed by casinos, and explore the interplay between individuals' perceptions of gambling, their psychological profiles, and resultant behaviors. The study also assessed the efficacy of doubling and continuous betting tactics and

provided suggestions for the marketing, management, and regulation of the gaming sector. The findings of this study provide valuable information for scholars, governments, and individuals seeking to make informed assessments regarding gaming activities. The present paper exhibits certain limitations and the study conducted within its scope is not sufficiently comprehensive. The objective is to enhance it in subsequent investigations.

References

- [1] Shou-Tsung Wu, Yeong-Shyang Chen. (2014). The social, economic, and environmental impacts of casino gambling on the residents of Macau and Singapore. Tourism Management. 2015, Volume 48, 285-298.https://doi.org/10.1016/j.tourman.11.013.
- [2] Po Oei, T., Lin, J., & Raylu, N. (2008). The Relationship Between Gambling Cognitions, Psychological States, and Gambling: A Cross-Cultural Study of Chinese and Caucasians in Australia. Journal of Cross-Cultural Psychology, 39(2), 147–161. https://doi.org/10.1177/0022022107312587
- [3] Namrata Raylu, Tian Po Oei. (2004). Role of culture in gambling and problem gambling, Clinical Psychology Review, Volume 23, Issue 8, Pages 1087-1114. https://doi.org/10.1016/j.cpr.2003.09.005
- [4] Rachlin H, Safin V, Arfer KB, Yen M. The attraction of gambling. J Exp Anal Behav. 2015 Jan;103(1):260-6. doi: 10.1002/jeab.113. Epub 2014 Nov 12. PMID: 25389046.
- [5] Turner, N.E. (1998). Doubling vs. Constant Bets as Strategies for Gambling. J Gambl Stud. 14, 413–429. https://doi.org/10.1023/A:1023029211215
- [6] Nicholas C. Barberis. (2012). A Model of Casino Gambling. Management Science, Vol. 58, No. 1, January 2012, pp. 35–51. http://dx.doi.org/10.1287/mnsc.1110.1435
- [7] Mark Griffiths Adrian Parke Richard Wood Jonathan Parke. (2006). Internet Gambling: An Overview of Psychosocial Impacts. ResearchGate.
- [8] Edwards, W. (1953). Probability-Preferences in Gambling. The American Journal of Psychology, 66(3), 349–364. https://doi.org/10.2307/1418231